CABOT

P: +1 617 345 0100
F: +1 617 345 0100
W: www.cabotcorp.com

Cabot Corporation
Two Seaport Lane
Suite 1300
Boston, MA 02210-2019
USA

January 27, 2017

Director, Air Enforcement Division
U.S. Environmental Protection Agency
MC 2242A
1200 Pennsylvania Ave, NW
Washington, D.C. 20460

John Blevins
Director, Compliance and Enforcement Division
U.S. Environmental Protection Agency, Region 6
1445 Ross Avenue
Dallas, TX 75202-2733

Chief, Environmental Enforcement Section
Environment and Natural Resources Division
U.S. Department of Justice
Box 7611 Ben Franklin Station
Washington, D.C. 20044-7611

Brandon B. Williams, LA BAR Roll# 27139
Attorney
Office of the Secretary, Legal Division
Louisiana Department of Environmental Quality
P.O. Box 4302
Baton Rouge, LA 70821-4302

Celena Cage
Enforcement Administrator
Louisiana Department of Environmental Quality
P.O. Box 4312
Baton Rouge, LA 70821-4312

RE: **Semi-annual Compliance Reports for the Canal, Pampa, and Ville Platte Plants for the Reporting Period: July 1, 2016 – December 31, 2016, Consent Decree # 6:13-CV-03095; March 11, 2014; AI # 19901 & 1291**

Dear Madam or Sir,

In compliance with Section XII, Paragraph 49 of the Consent Decree between the United States of America, the Louisiana Department of Environmental Quality and Cabot Corporation, Cabot is hereby submitting its Semiannual Compliance Reports for the above referenced plants and reporting period.

I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system or those persons directly responsible for gathering the information, the information is, to the best of my knowledge and belief, true, accurate and complete. I am aware that there are significant penalties for submitting false information and including the possibility of fine and imprisonment for knowing violations.

Best Regards,

Martin O'Neill
Senior Vice President - Safety Health & Environment

Attachments
cc: Gerard Caron, Gordon Reynolds, Cabot Corporation
Bart Cassidy, Manko, Gold, Kitcher & Fox, LLP

CABOT CORPORATION
USEPA-LDEQ-CABOT CONSENT DECREE
SEMIANNUAL COMPLIANCE REPORT

PAMPA PLANT

REPORTING PERIOD: JULY 1, 2016 – DECEMBER 31, 2016

a. A description of the construction of the Control Technologies, CEMS, and PM Early Warning Systems required by this Consent Decree, including:

i. If construction is not underway, any available information concerning the construction schedule and the execution of major contracts.

Construction is complete at the site, operational shake-down tests of the systems began in October.

ii. If construction is underway, the estimated percent of installation as of the end of the reporting period, the current estimated construction completion date, and a brief description of completion of significant milestones during the reporting period.

Construction of the control systems and CEMs are complete, as detailed below.

- Preliminary Engineering & Design – Complete
- Detailed Engineering – Complete
- The project is mechanically complete.
  - All equipment, pipe, power, instrumentation, controls installed and checked out. This includes Burner/SCR Tower, CEM's, and all auxiliary systems.
- Commissioning /Start-up/Testing and Qualification
  - The Burner/SCR Tower was commissioned and ready for shake-down testing by mid-November 2016
  - Startup work began in November 2016.
  - The Burner/SCR Tower start-up is taking longer than expected due to technology issues with the Burner/SCR Tower, (see iii below).
- RATA test is currently scheduled for the week of 2/27/2017, but may be affected by the Burner/SCR issues (see iii below).
- Target compliance - 3/11/2017, but may be affected by the Burner/SCR issues (see iii below).

iii. Any information indicating that installation and commencement of operation may be delayed, including the nature and cause of the delay.

The project was mechanically complete in mid-October 2016. Instrument checks and auxiliary equipment were checked out and operational by the end of October 2016. The Burner/SCR Tower was commissioned and ready for shake-down testing by mid-November 2016.

A series of technology issues were identified during the Burner/SCR Tower Start-up. The primary issue identified is that the Burner/SCR Tower does not provide the BTU output required to operate the tower as designed and therefore waste gas has not been introduced. Cabot has been working with the supplier aggressively since December 1st, 2016 to implement changes required to increase the Burner/SCR Tower BTU capacity. Actions taken include the purchase and installation of additional equipment, a new fan motor, a new power supply, and mechanical modifications to the Burner/SCR Tower Equipment.

Startup activity is estimated to recommence with these modifications the week of 1/30/17.

iv. *Once construction is complete, provide the dates the equipment was placed in service and/or commenced Continuous Operation and the dates of any testing that was performance during the period.*

Consistent with the provisions of the Consent Decree, construction activity was completed during the relevant reporting period and shakedown testing began. The unit has not been placed in service.

b. ***All information necessary to demonstrate compliance with all applicable Emissions Limits, 30-day Rolling Average Sulfur Content Weight Percent, 365-day Rolling Average Sulfur Content Weight Percent, and other provisions in Sections VI (SO_2 Control Technology, Emissions Limits, and Monitoring Requirements), VII (NOx Control Technology, Emissions Limits, and Monitoring Requirements) and VIII (PM Control Technology, Emissions Limits, Best Management Practices, and Early Warning System Requirements)***

- *Paragraph 22, Feedstock Sulfur Content Monitoring Requirements.*

On December 31, 2014, Cabot instituted feedstock sulfur monitoring, as required by Section VI, Paragraph 22 pursuant to the terms of the Consent Decree to demonstrate compliance with the 30-day rolling average sulfur content weight percent as required by Paragraph 21. The relevant information is provided in Attachment 1.

Cabot continues to monitor its 365 – day rolling average of the feedstock sulfur content weight percent during the reporting period. During this period, the 365-day rolling average feedstock sulfur content weight percent remained in full compliance with the limitations set in Section VI, Paragraph 21. The supporting documentation is provided in Attachment 1.

- *Paragraph 26 - NOx Process System Operation Emissions Limits and Control Technology*

The current scope of work includes the following major equipment:

- A high performance thermal oxidizer with a multi-stage burner system for the combined exhaust of ATUs GP-6 and GP-9;

- A SCR control system, to be installed in the flue gas streams of the ATU thermal oxidizers;

- A separate vent stack for the GP-9 casing gas stream and utilization of the existing GP-6 casing gas vent stack; and,

- A single vent stack downstream of the SCR.

The expected performance of the system is expected to meet and exceeds the requirements of the Consent Decree.

- *Paragraph 32 and Appendix B - Other PM Control Requirements*

During the reporting period, Cabot achieved and maintained compliance with the requirements of Paragraph 32 and Appendix B the Consent Decree relative to particulate matter ("PM") control

requirements. More specifically, for each PM emissions equipment unit:

- Cabot employed the relevant PM reduction mechanism and method for managing PM emissions specified in Appendix B of the Consent Decree.
- Cabot completed the relevant daily visual assessments, and maintained a record of the results of each such assessment.
- Cabot did not observe visible emissions as a result of any of the daily visual assessments during the reporting period. Accordingly, Cabot was not required during this reporting period to perform any six-minute Method 9 evaluation in response to an observation of visible emissions during the required daily visual assessments.

- *Paragraph 33 and Appendix C - Particulate Emissions Best Management Practices Control Plan*

Cabot continued to implement the Particulate Emissions Best Management Practices Control Plan set forth in Appendix C of the Consent Decree, to the extent required during the reporting period.

- *Paragraph 34 and Appendix D - PM Early Warning System*

Pursuant to the conditions of the Consent Decree, Cabot initiated compliance with applicable requirements of the Consent Decree related to the PM Early Warning System on March 11, 2015. During the reporting period, Cabot operated each PM Early Warning System at all times on Heat Load and Process System Operation, except during system breakdowns, repairs, maintenance, calibration checks, and zero and span adjustments of the applicable system, for each particulate monitor.

During the reporting period, Cabot achieved a data availability of greater than 90% based on a quarterly average of the operating time of the emission unit or activity being monitored, and therefore, achieved full compliance with the minimum degree of availability requirements of the Consent Decree. In addition, in response to any alarm triggered during the reporting period for any PM Early Warning System at the facility, Cabot investigated the cause of the alarm as expeditiously as practicable and performed the required sequence of tasks to respond to the alarm.

On each Operating Day in this reporting period, Cabot conducted a visual review of the recorded data for each PM Early Warning System to identify trends in relative PM emissions.

Cabot also conducted routine maintenance during the reporting period in accordance with manufacturer's recommendations as addressed within the provisions in Paragraphs D.8a and D.8b of the Consent Decree.

c. ***All data collected for each Pampa Process System, from the time any 30-day Rolling Average Sulfur Content Weight Percent and/or 365-day Rolling Average Sulfur Content Weight Percent is exceeded until compliance is achieved, and an explanation of any periods of downtime of any relevant equipment that prohibited the collection of such data.***

During the reporting period, there were no periods of exceedance of the 30-day and/or 365-day rolling average sulfur content weight percent.

d. All CEMS data collected for each Process System, from the time any Emissions Limit in Sections VI (SO_2 Control Technology, Emissions Limits, and Monitoring Requirements) and VII (NOx Control Technology, Emissions Limits, and Monitoring Requirements) is exceeded until compliance is achieved, and an explanation of any periods of downtime of such CEMS.

- *Paragraph 29 - NOx Monitoring Requirements*

Pursuant to the terms of the Consent Decree, compliance with these requirements is not required until 3 years from the effective date of the Consent Decree, specifically no later than March 11, 2017.

f. All PM Early Warning System data collected, from the time a PM Early Warning System alarm is triggered until the PM Early Warning System data have returned to normal operating ranges, below levels triggering an alarm condition, and an explanation of any periods of PM Early Warning System downtime

Data collected for each event in which a PM Early Warning System alarm was triggered during this reporting period is presented in Attachment 2.

A summary of the periods of PM Early Warning System downtime, providing the required explanation for each such period, is presented in Attachment 3.

g. A description of any violation of the requirements of this Consent Decree, including any violation resulting from Malfunctions, any exceedance of an Emissions Limit, any exceedance of a 30-day rolling Average Sulfur Content Weight Percent or 365-day Rolling Average Weight Percent, or any failure to install, commence operation or Continuously Operate and Control Technology or any PM Early Warning System, which includes:

i. the date and duration of, and the quantity of any emissions related to, the violation;

ii. a full explanation of the primary root cause and any other significant contributing cause(s) of the violation;

iii. a root cause analysis of all reasonable interim and long-term remedial steps or corrective actions, including all design, operation, and maintenance changes consistent with good engineering practices, if any, that could be taken to reduce or eliminate the probability of recurrence of such violation, and, if not already completed, a schedule for its (their) implementation, or, if Defendant concludes that remedial steps or corrective actions should not be conducted, the basis for that conclusion.

Cabot is not aware of any violation of the requirements of the Consent Decree during this reporting period.

h. If no violations occurred during a reporting period, a statement that no violations occurred

Cabot is not aware of any violation of the requirements of the Consent Decree during this reporting period.

PAMPA PLANT

REPORTING PERIOD: JULY 1, 2016 – DECEMBER 31, 2016

i. ***A description of the status of any permit applications and any proposed SIP revisions required under this Consent Decree***

Cabot filed a Standard Permit Application with the TCEQ, dated November 16, 2015 for the construction and operation of the pollution control equipment required by the Consent Decree for the Pampa Plant. Additional information was provided to the TCEQ during the review period. The permit for the project was issued by TCEQ on January 6, 2016, Standard Permit Registration Number 137239.

j. ***A summary of all actions undertaken and Project Dollars expended during the reporting period, as well as any cumulative Project Dollars expended, and the estimated environmental benefits achieved to date in satisfaction of the requirements of Section V (Environmental Mitigation) and Appendix A.***

The project certification for these projects was submitted to the EPA on September 9, 2014 by Cabot.

PAMPA PLANT

REPORTING PERIOD: JULY 1, 2016 – DECEMBER 31, 2016

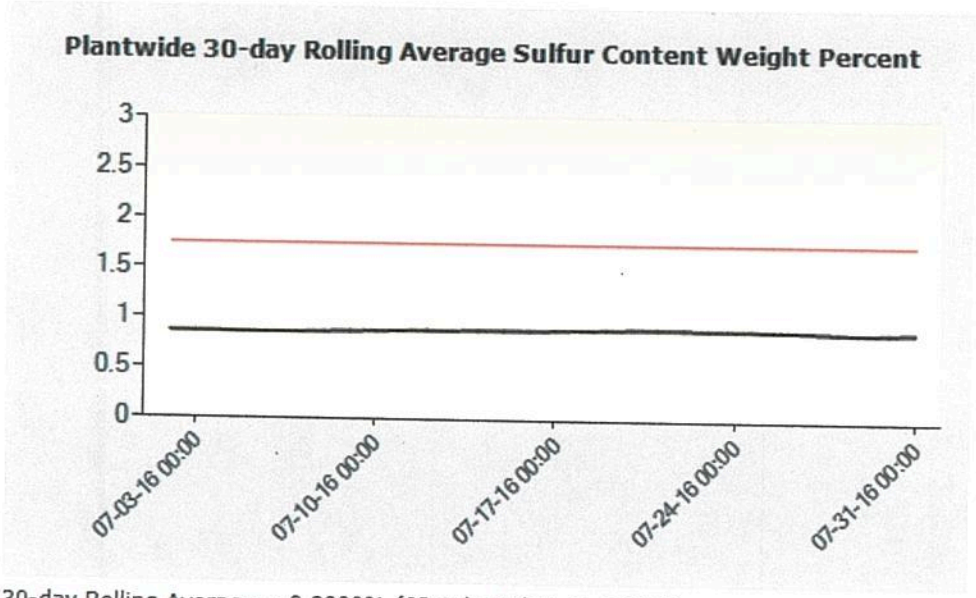
ATTACHMENT 1

FEEDSTOCK SULFUR 30-DAY ROLLING AVERAGE AND 365-DAY ROLLING AVERAGE COMPLIANCE TRACKING DATA

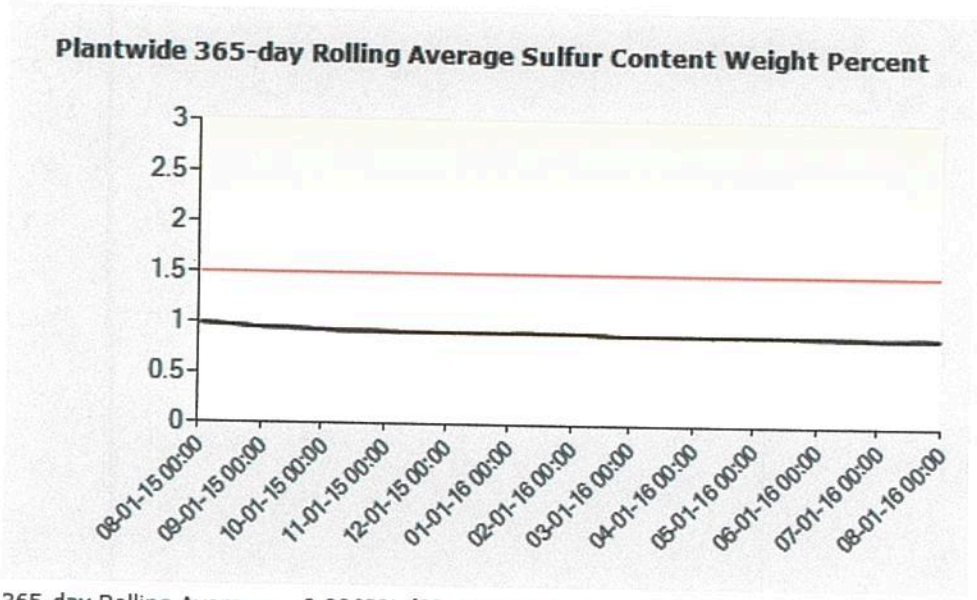
PAMPA PLANT

REPORTING PERIOD: JULY 1, 2016 – DECEMBER 31, 2016

Select a Date: 31-Jul-16 00:00



30-day Rolling Average = 0.8900% (02-Jul-16 thru 31-Jul-16)

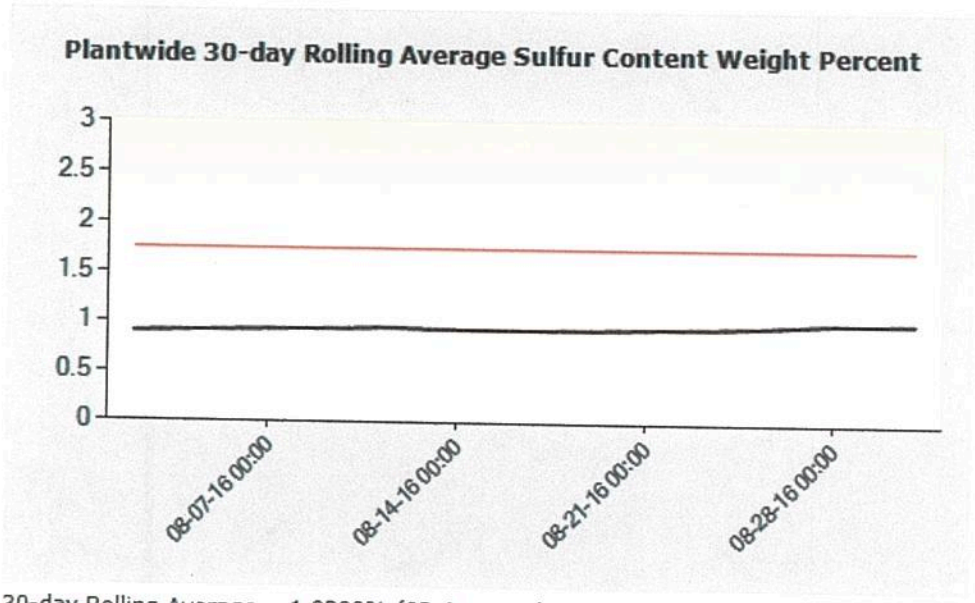


365-day Rolling Average = 0.8863% (02-Aug-15 thru 31-Jul-16)

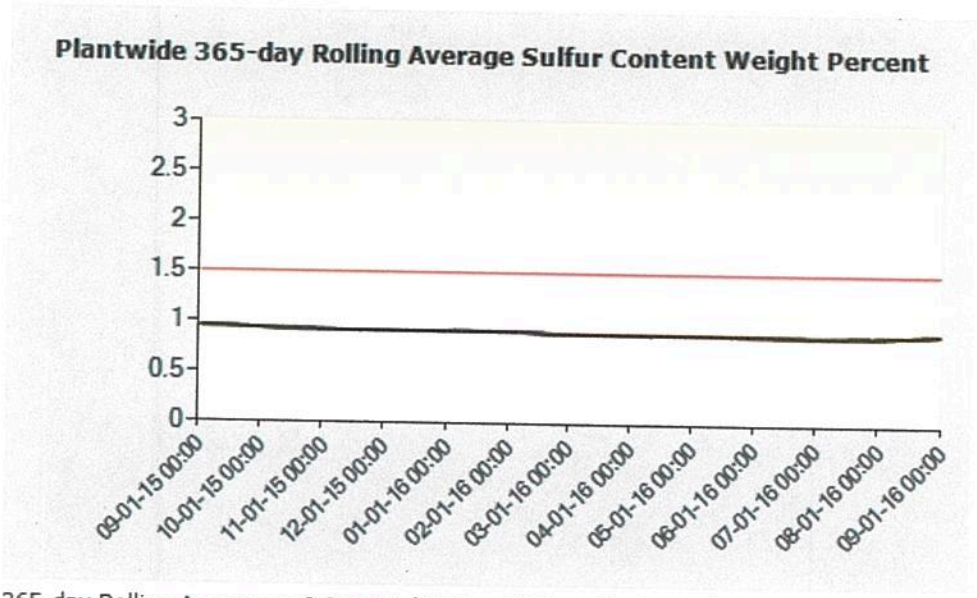
PAMPA PLANT

REPORTING PERIOD: JULY 1, 2016 – DECEMBER 31, 2016

Select a Date: 31-Aug-16 00:00



30-day Rolling Average = 1.0209% (02-Aug-16 thru 31-Aug-16)

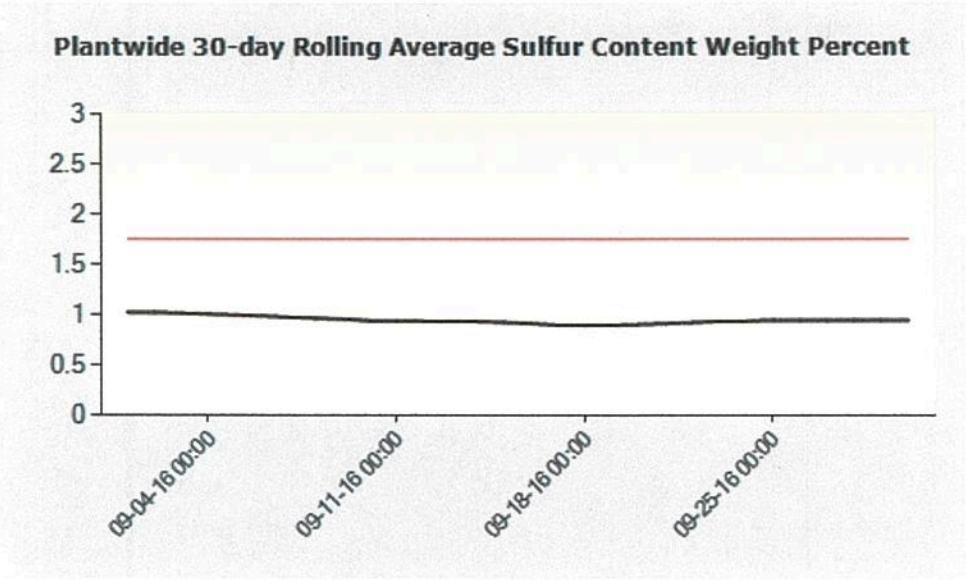


365-day Rolling Average = 0.9142% (02-Sep-15 thru 31-Aug-16)

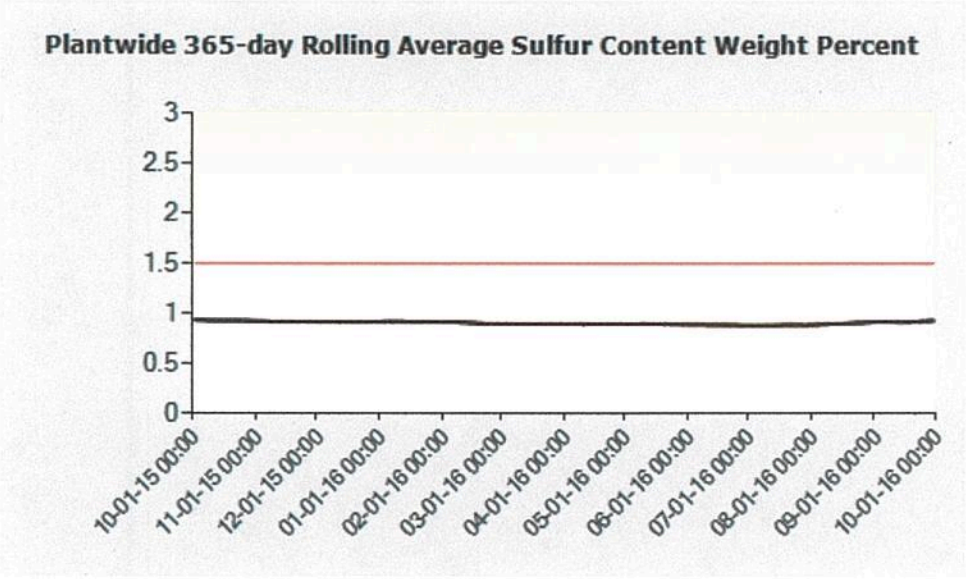
PAMPA PLANT

REPORTING PERIOD: JULY 1, 2016 – DECEMBER 31, 2016

Select a Date: 30-Sep-16 00:00



30-day Rolling Average = 0.9449% (01-Sep-16 thru 30-Sep-16)

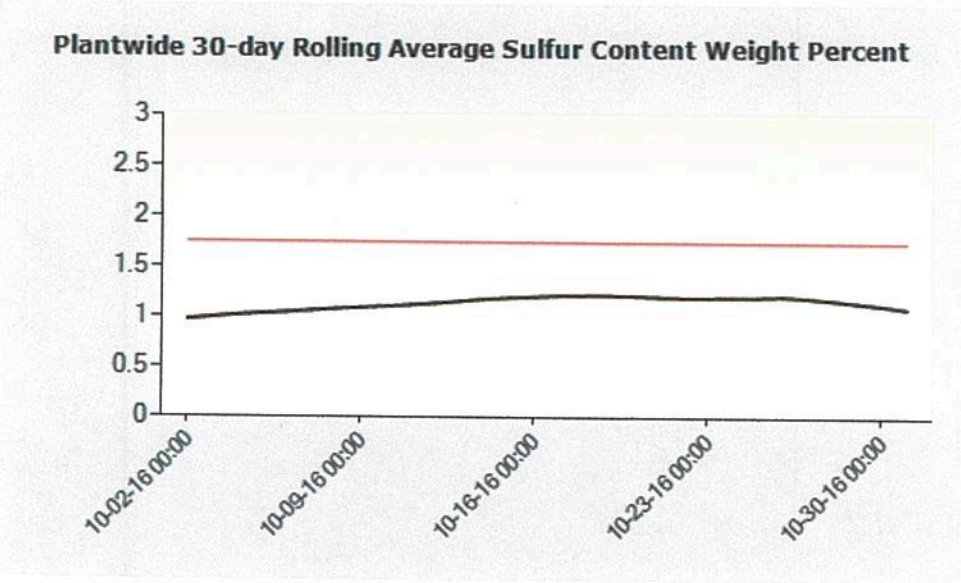


365-day Rolling Average = 0.9272% (02-Oct-15 thru 30-Sep-16)

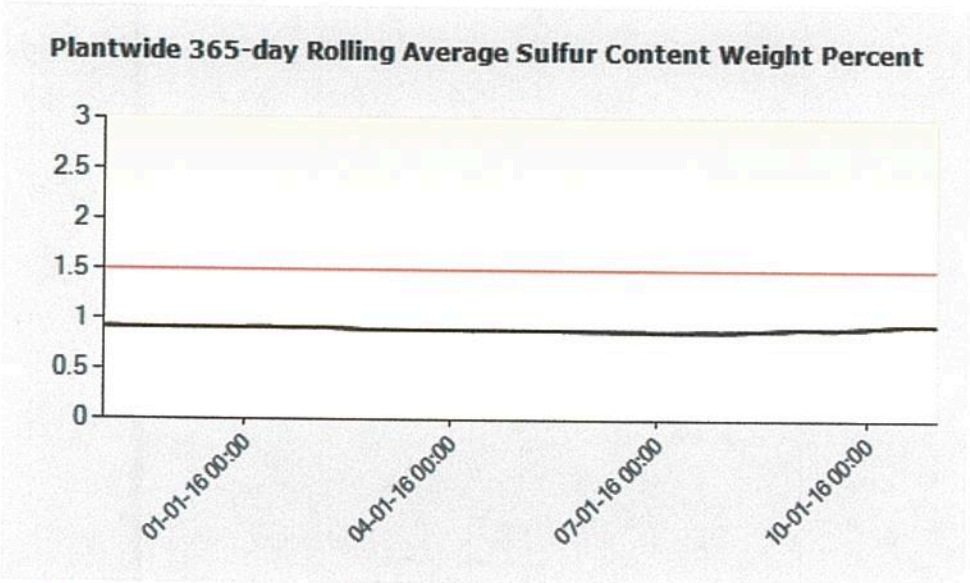
PAMPA PLANT

REPORTING PERIOD: JULY 1, 2016 – DECEMBER 31, 2016

Select a Date: 31-Oct-16 00:00



30-day Rolling Average = 1.0967% (02-Oct-16 thru 31-Oct-16)

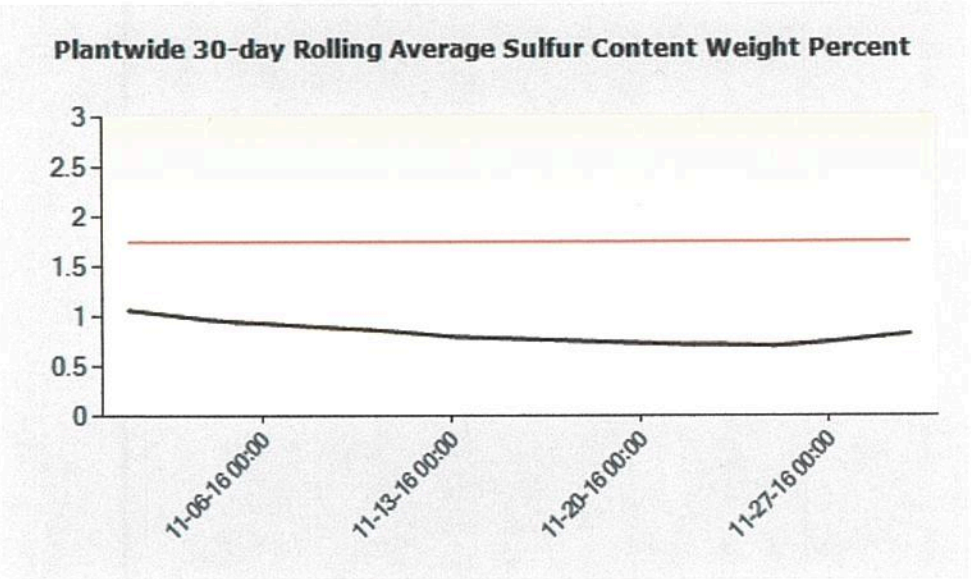


365-day Rolling Average = 0.9518% (01-Nov-15 thru 31-Oct-16)

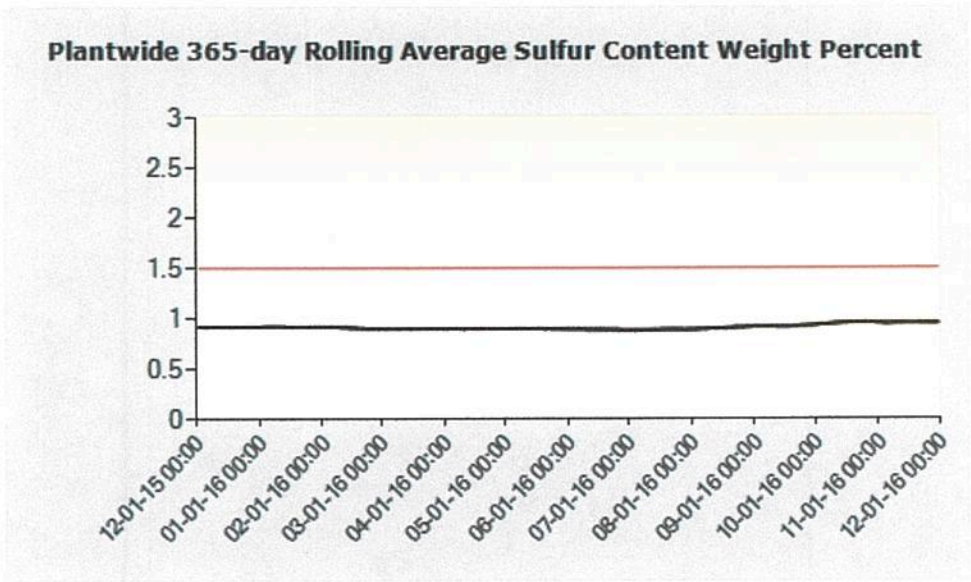
PAMPA PLANT

REPORTING PERIOD: JULY 1, 2016 – DECEMBER 31, 2016

Select a Date: 30-Nov-16 00:00



30-day Rolling Average = 0.8197% (01-Nov-16 thru 30-Nov-16)

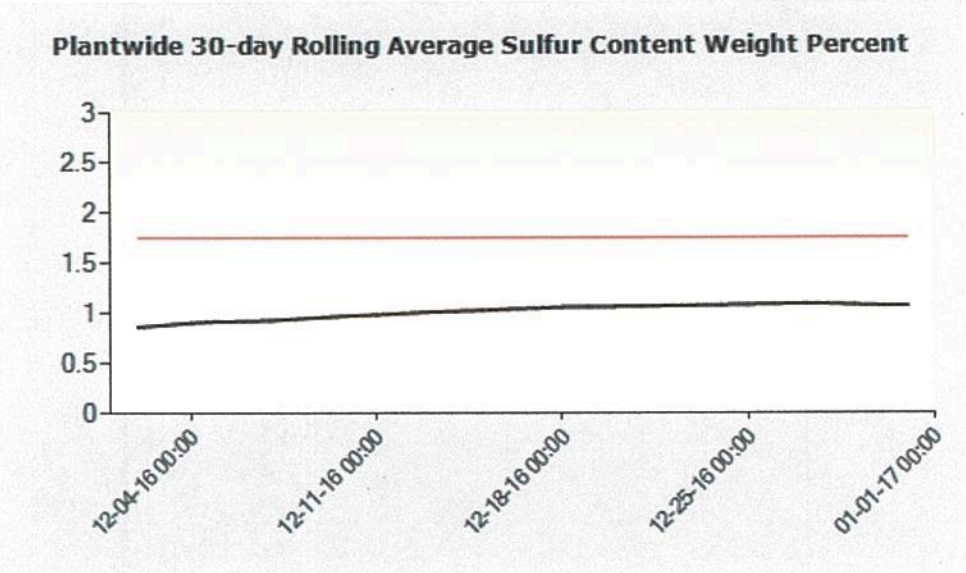


365-day Rolling Average = 0.9493% (02-Dec-15 thru 30-Nov-16)

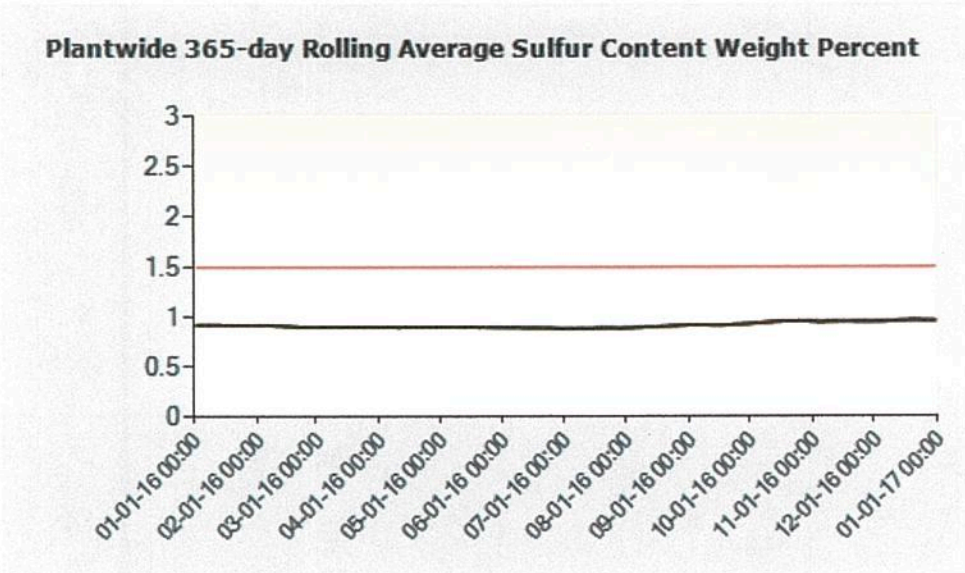
PAMPA PLANT

REPORTING PERIOD: JULY 1, 2016 – DECEMBER 31, 2016

Select a Date: 31-Dec-16 00:00



30-day Rolling Average = 1.069% (02-Dec-16 thru 31-Dec-16)



365-day Rolling Average = 0.9606% (02-Jan-16 thru 31-Dec-16)

PAMPA PLANT

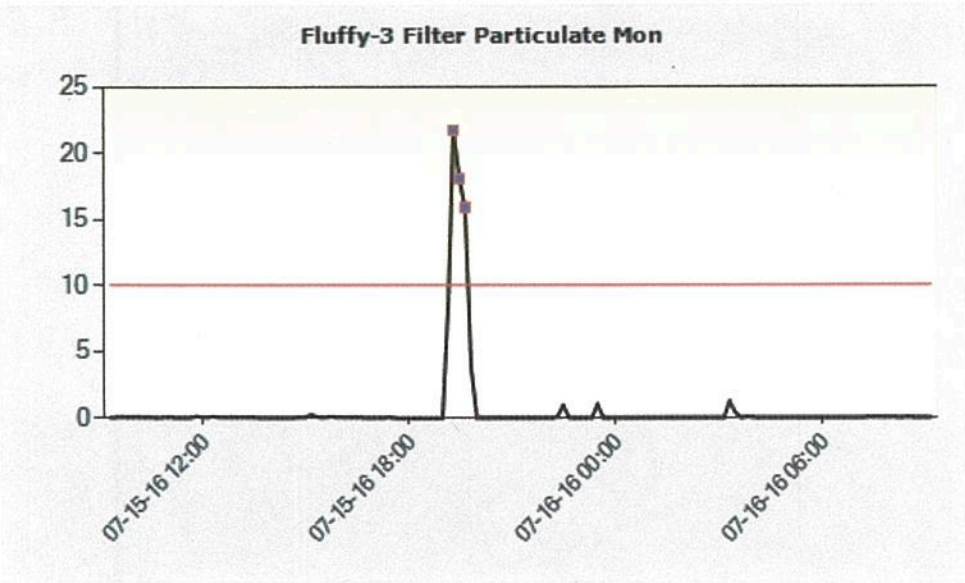
REPORTING PERIOD: JULY 1, 2016 – DECEMBER 31, 2016

ATTACHMENT 2

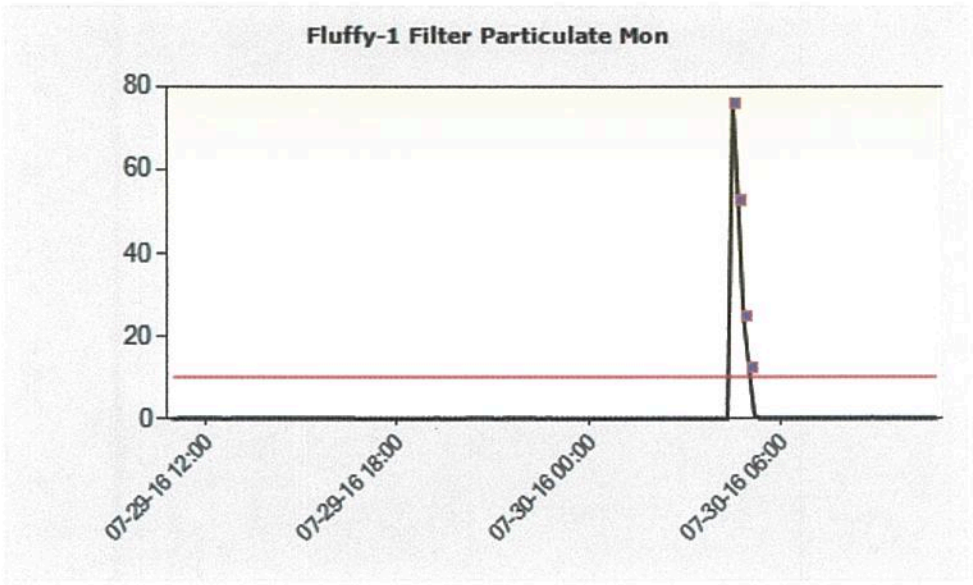
PM EARLY WARNING SYSTEM DATA COLLECTED DURING HIGH PM EMISSIONS EVENTS

PAMPA PLANT

REPORTING PERIOD: JULY 1, 2016 – DECEMBER 31, 2016



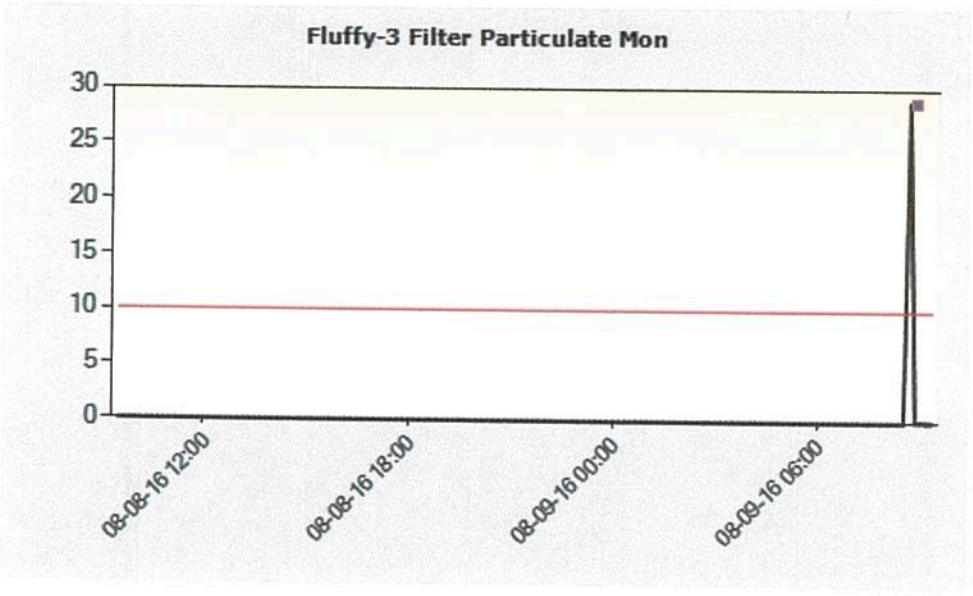
Unit: Fluffy-3 Process Filter Particulate Monitor
Date: July 15th Duration: 30 minutes
Description: Fluffy 3 filter was not in use at the time. The unit was already switched from Fluffy 3 to Fluffy 1. High PM alarm may have been triggered by rainy weather conditions. No visible emissions observed.



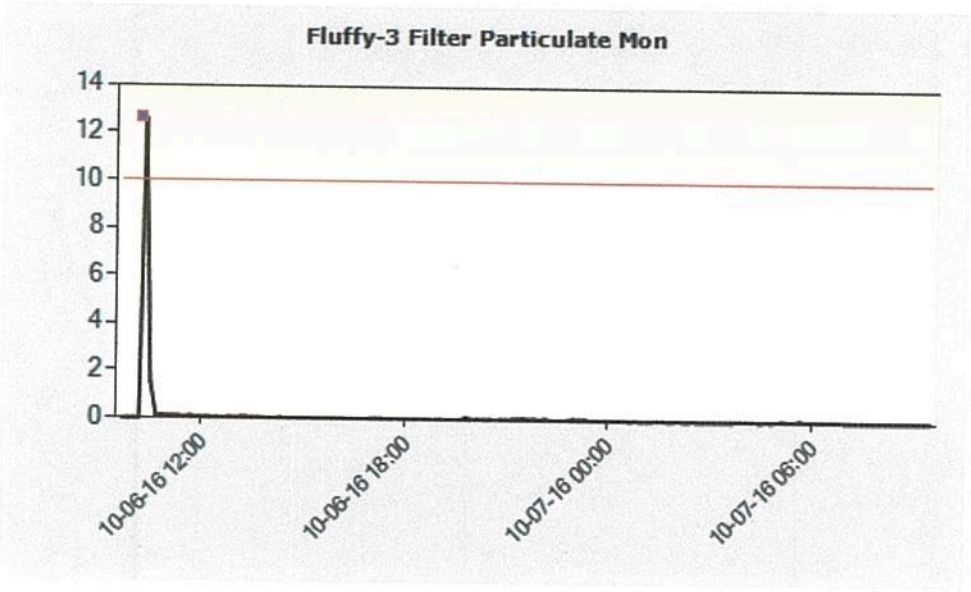
Unit: Fluffy 1 Filter Particulate Monitor
Date: July 30th Duration: 1 hour 20 minutes
Description: Alarm received while blowing out transmitter. No visible emissions

PAMPA PLANT

REPORTING PERIOD: JULY 1, 2016 – DECEMBER 31, 2016



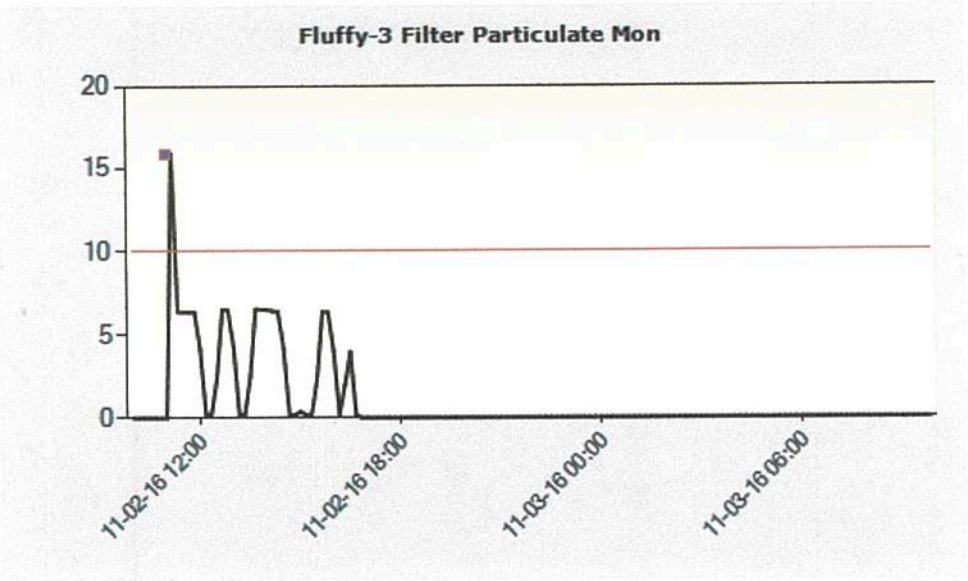
Unit: Fluffy-3 Process Filter Particulate Monitor
Date: August 9th Duration: 10 minutes
Description: Alarm occurred during unit start up from cold. No visible emissions were observed from the stack. The alarm cleared with the unit reached normal steady state conditions.



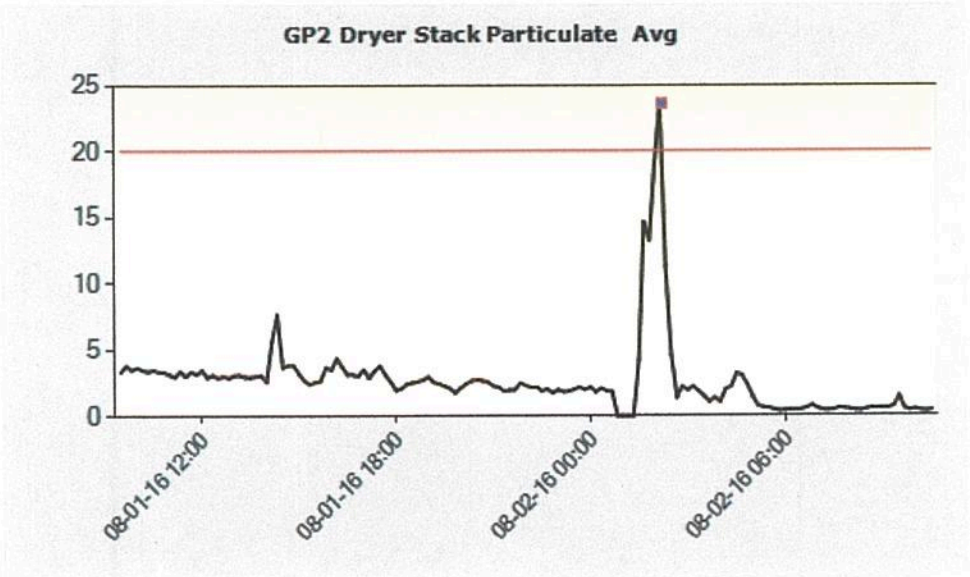
Unit: Fluffy-3 Process Filter Particulate Monitor
Date: October 6th Duration: 10 minutes
Description: A high PM alarm was received while starting the system up from cold. When the exhaust fan was started, a spike was observed at the control station. Operator went outside immediately to observe his stack. No visible emissions were seen and the alarm cleared after steady state operating conditions were reached.

PAMPA PLANT

REPORTING PERIOD: JULY 1, 2016 – DECEMBER 31, 2016



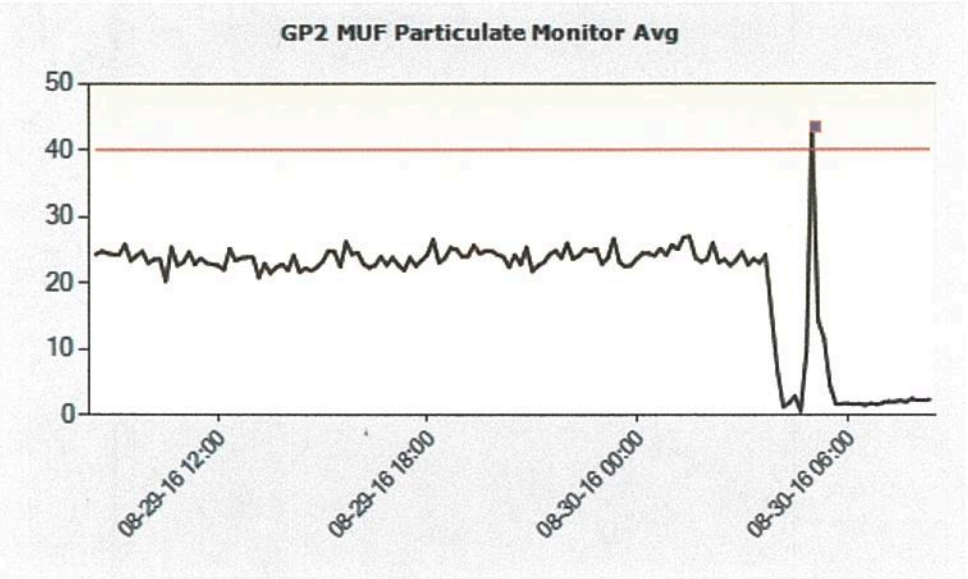
Unit: Fluffy-3 Process Filter Particulate Monitor
Date: November 2nd Duration: 10 minutes
Description: Conveying fan started after being worked on and down for an extend time. No visible emissions.



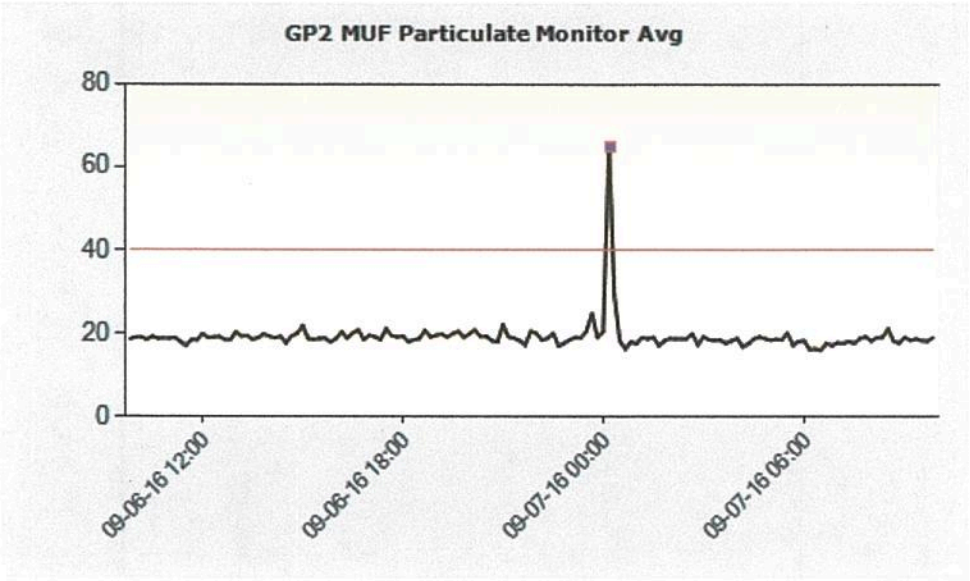
Unit: GP-2 Dryer Stack
Date: August 2nd Duration: 10 minutes
Description: The unit was being swapped from tailgas to natural gas. This process surge resulted in a high PM alarm. The stack was checked by the process operator and no visible emissions were observed. The alarm cleared when steady state operation was resumed.

PAMPA PLANT

REPORTING PERIOD: JULY 1, 2016 – DECEMBER 31, 2016



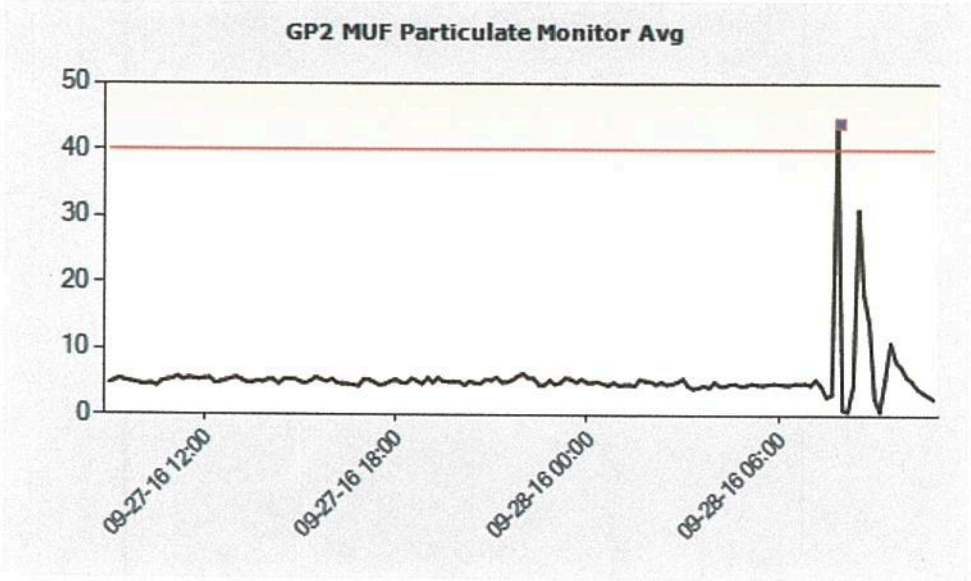
Unit: GP-2 Main Unit Filter
Date: August 30th Duration: 10 minutes
Description: All reactors were on Heatload and not making product when the high PM alarm was received. Alarm was likely due to excess moisture being introduced into the Main Unit Filter for cooling purposes.

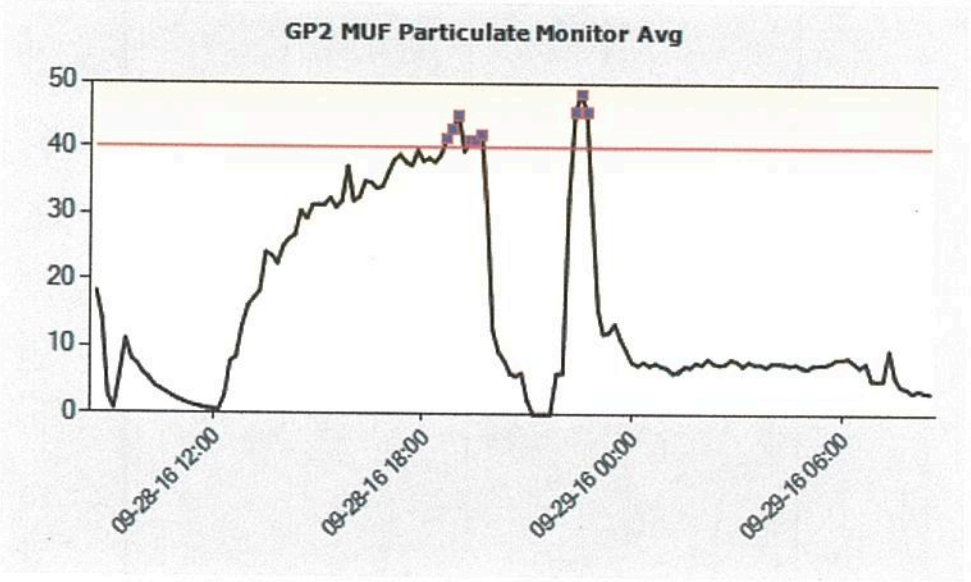


Unit: GP-2 Main Unit Filter
Date: September 7th Duration: 10 minutes
Description: High PM alarm due to accidental shutoff of air to the rotary meter and transmitter. There were no visible emissions. Air was turned back on as soon as it was recognized and the alarm cleared.

PAMPA PLANT

REPORTING PERIOD: JULY 1, 2016 – DECEMBER 31, 2016

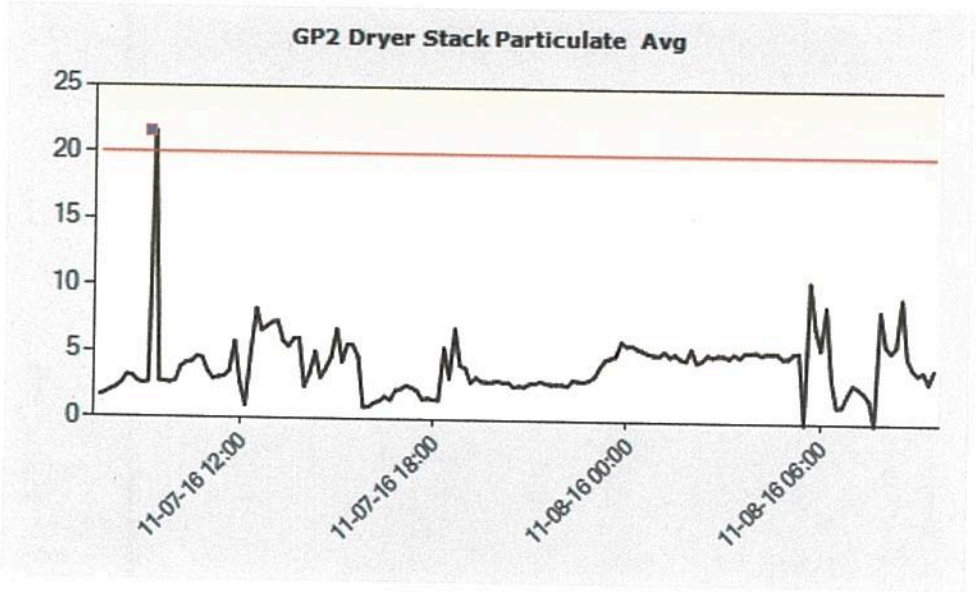




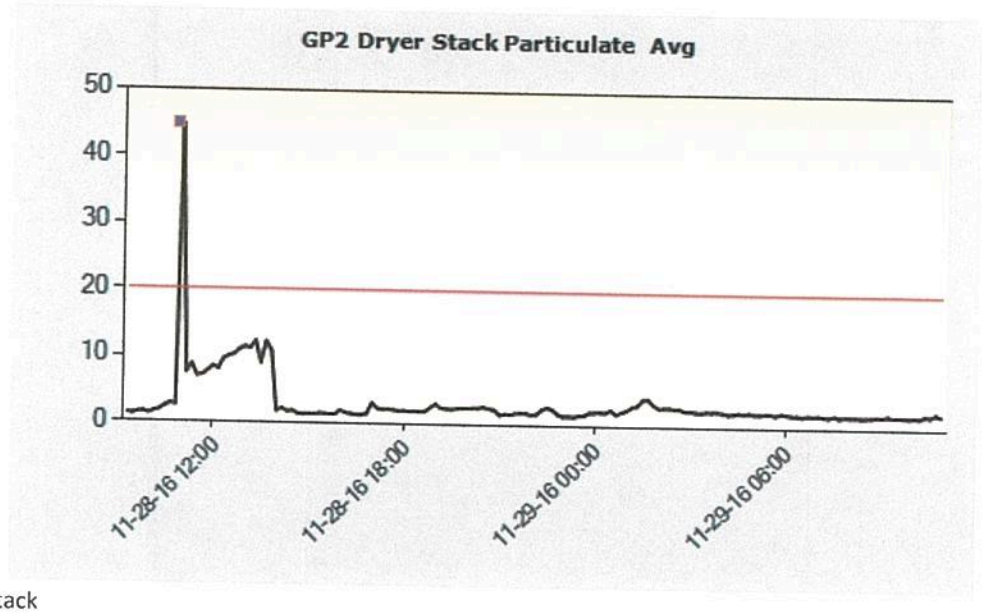
Unit: GP-2 Main Unit Filter
Date: September 28th Duration: 1 hour; 3 hours 10 minutes
Description: **1st event**: High PM alarm occurred during the process of starting the unit up. Operators tried to add air to clean the PM monitors but were unsuccessful. Unit was taken down to heatload until maintenance could come and clean the particulate monitors. **2nd event:** Unit was still on heatload. There were no visible emissions during either event.

PAMPA PLANT

REPORTING PERIOD: JULY 1, 2016 – DECEMBER 31, 2016



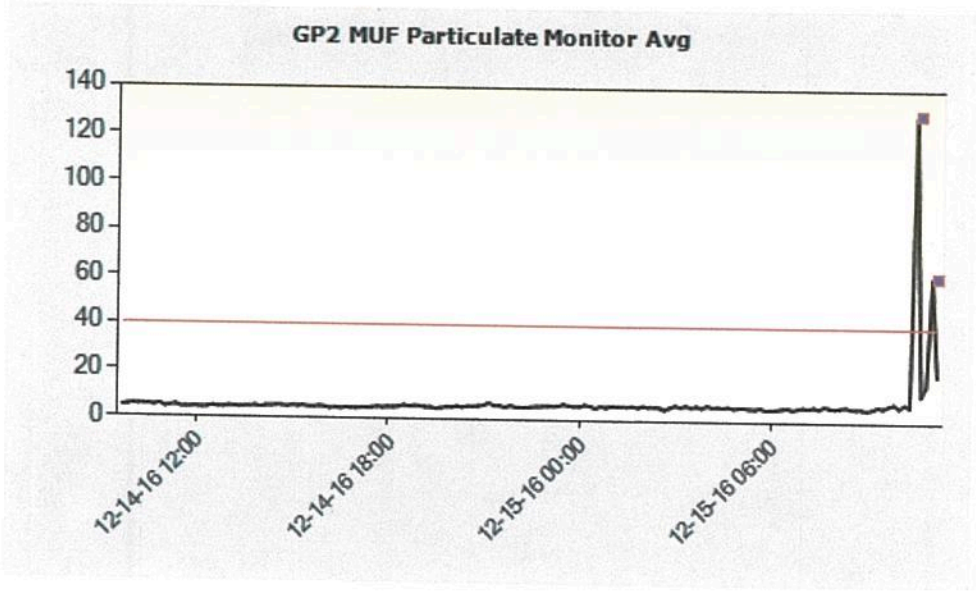
Unit: GP-2 Dryer Stack
Date: November 7th Duration: 10 minutes
Description: Process operator was in the act of switching from NG to Tail Gas as a fuel source. When this transition happens, a shock to the system and introduction of excess moisture (tailgas) occurs. This shock to the system is what triggered the High PM alarm. Operator went and monitored his stack and no visible emissions were observed. The alarm cleared when normal operating conditions resumed. No further alarms.

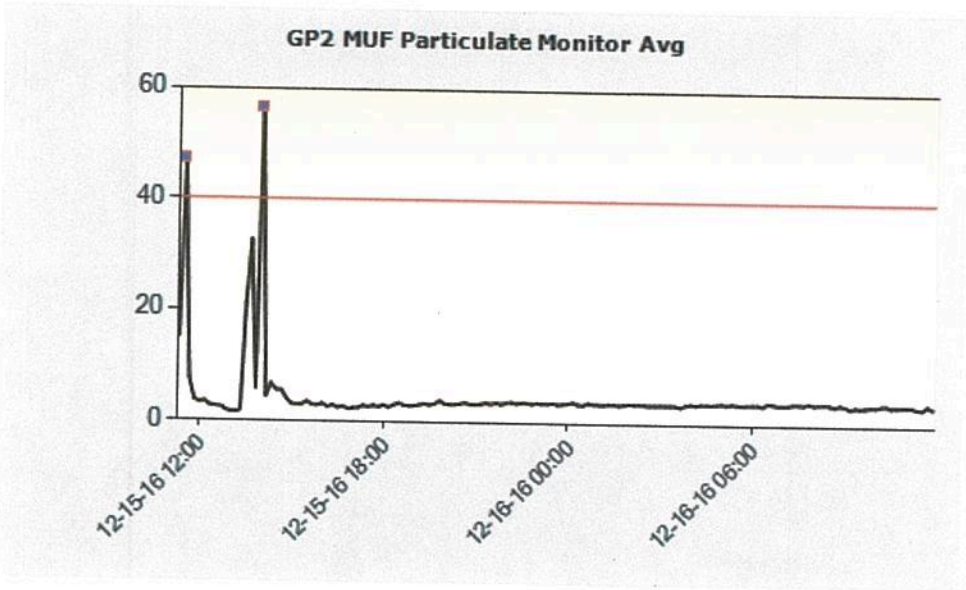


Unit: GP-2 Dryer Stack
Date: November 28th Duration: 10 minutes
Description: While in the process of switching the GP 2 dryers from NG to Tailgas, a high PM alarm was received. Tailgas contains excess moisture which, when introduced into the dryer can cause false alarms. At no time were visible emissions observed from the stack. The alarm cleared after steady state operation resumed.

PAMPA PLANT

REPORTING PERIOD: JULY 1, 2016 – DECEMBER 31, 2016

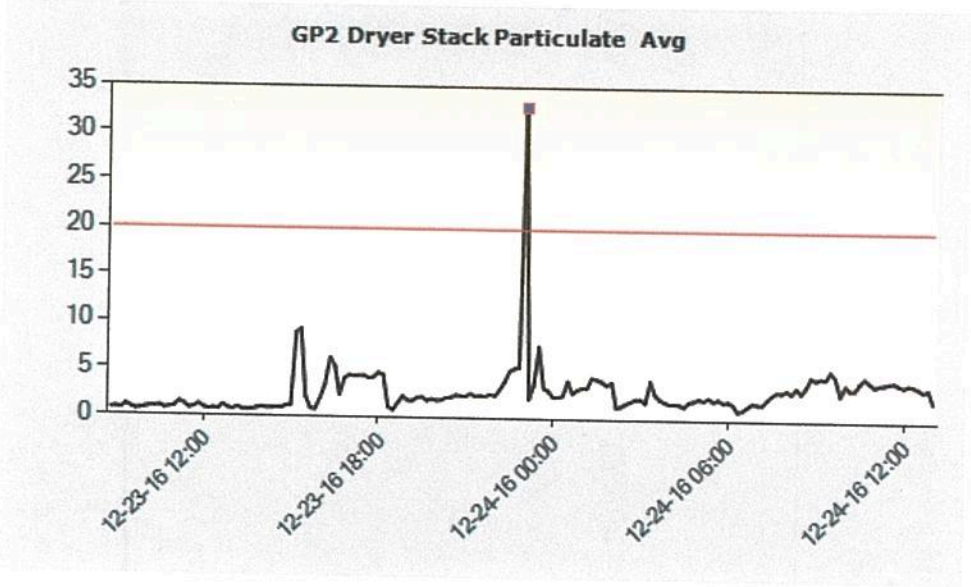




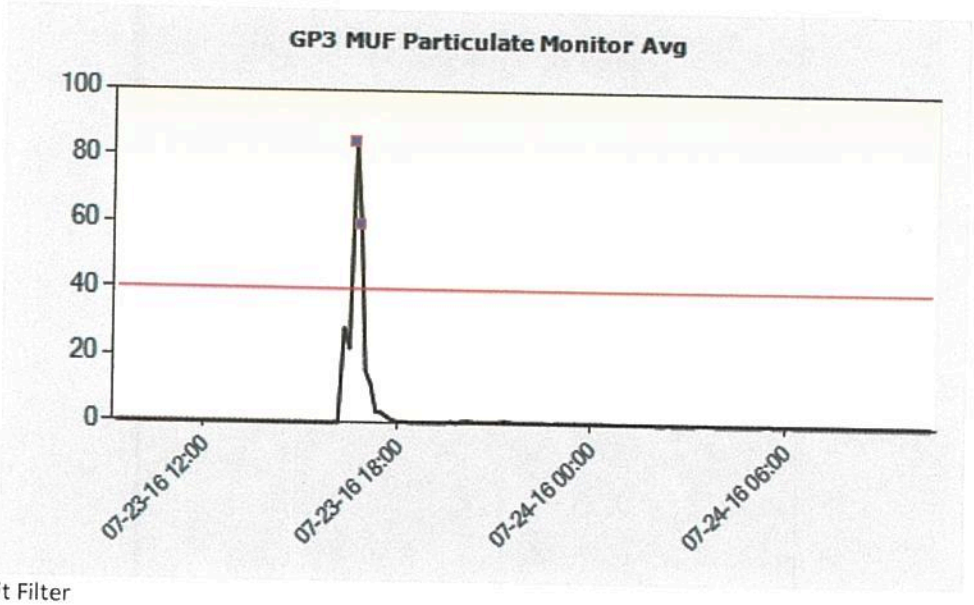
Unit: GP-2 Main Unit Filter
Date: December 15th Duration: 3 hours
Description: Repressuring fan went down and poppet became stuck due to freezing air lines. The unit was taken down for maintenance to work on problem. There were no visible emissions.

PAMPA PLANT

REPORTING PERIOD: JULY 1, 2016 – DECEMBER 31, 2016



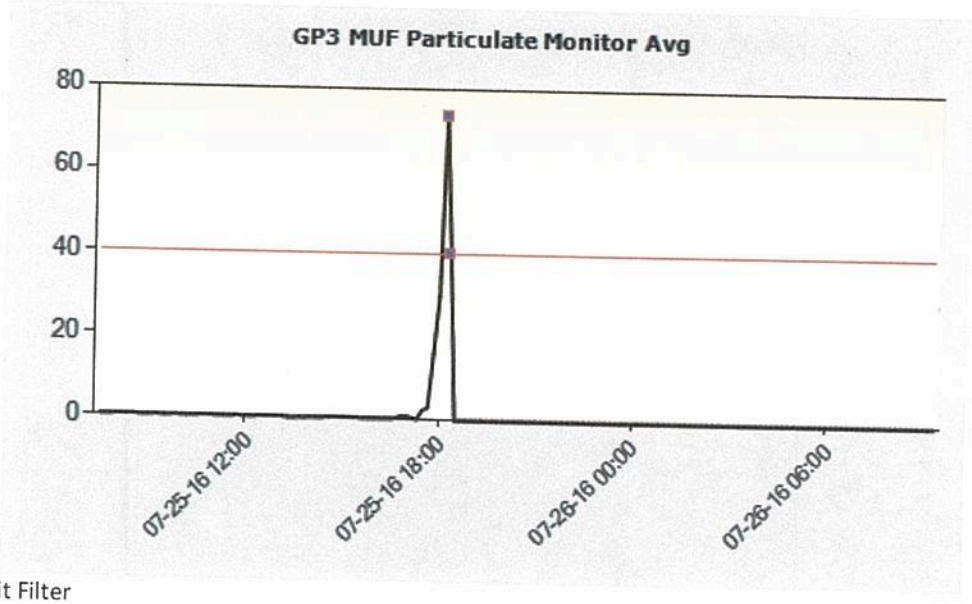
Unit: GP-2 Dryer Stack
Date: December 23rd Duration: 10 minutes
Description: While in the process of switching the GP 2 dryers from Tailgas to Natural gas, a high PM alarm was received. During the process, the dryer flamed out and had to be relit. At no time were visible emissions observed from the stack. The alarm cleared after steady state operation resumed.



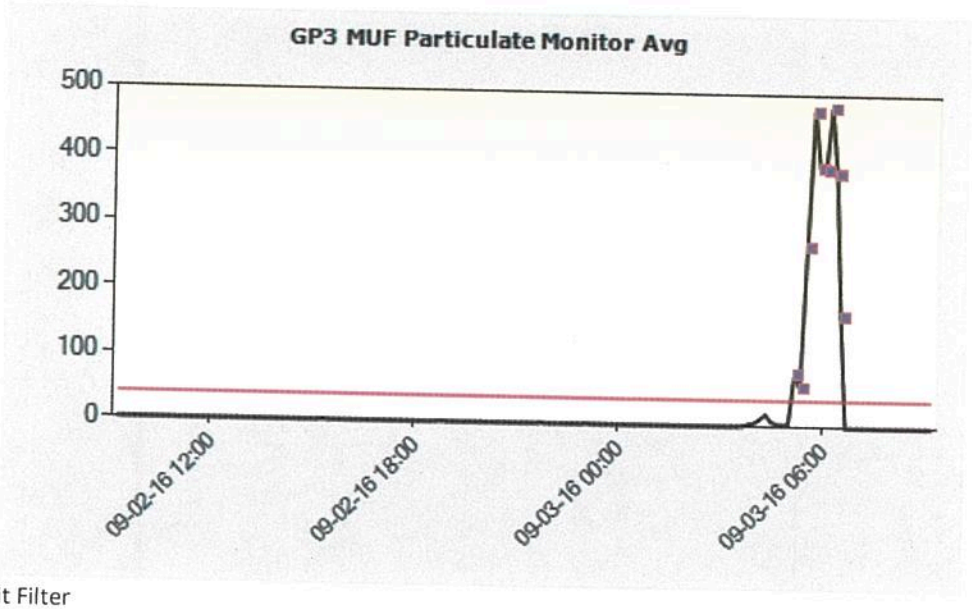
Unit: GP-3 Main Unit Filter
Date: July 23, 2016 Duration: 20 minutes
Description: Unit was on HL at the time of this alarm. There were no visible emissions.

PAMPA PLANT

REPORTING PERIOD: JULY 1, 2016 – DECEMBER 31, 2016



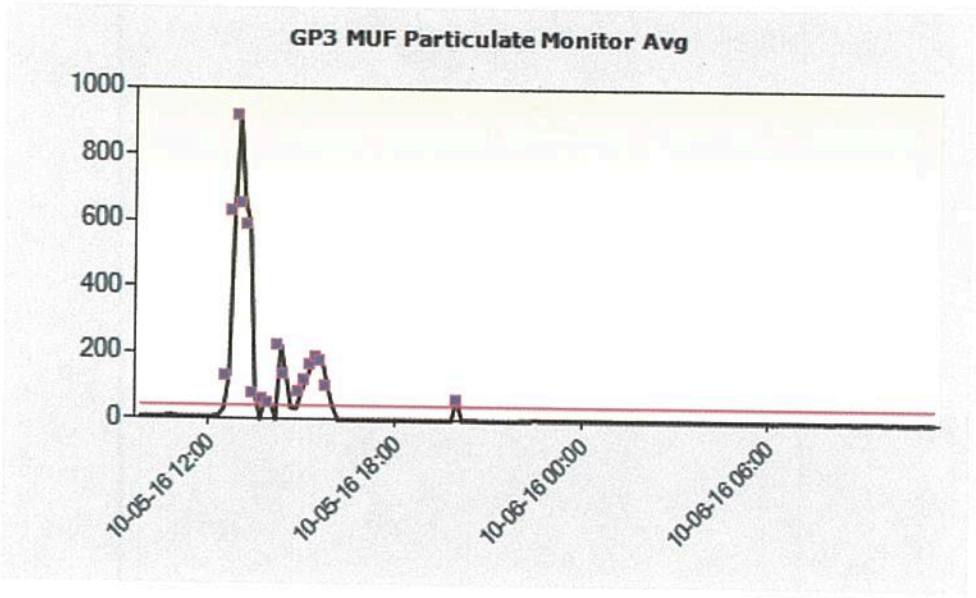
Unit: GP-3 Main Unit Filter
Date: July 25th Duration: 20 minutes
Description: The unit was currently on heatload, going down cold during this event. There were no visible emissions observed.



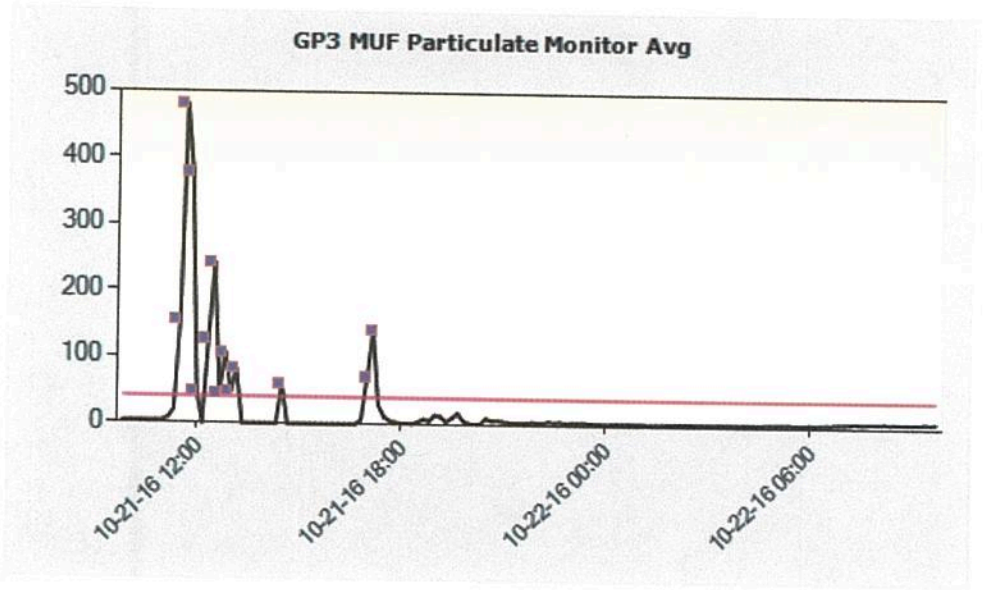
Unit: GP-3 Main Unit Filter
Date: September 3rd Duration: 1 hour 30 minutes
Description: Unit was not on Makeload when the high PM alarm was received. The unit was in the process of being cooled for shutdown. This process introduces excess moisture into the Main Unit Filter for cooling purposes. No emissions were observed and the alarms cleared when the reactor was flamed out.

PAMPA PLANT

REPORTING PERIOD: JULY 1, 2016 – DECEMBER 31, 2016

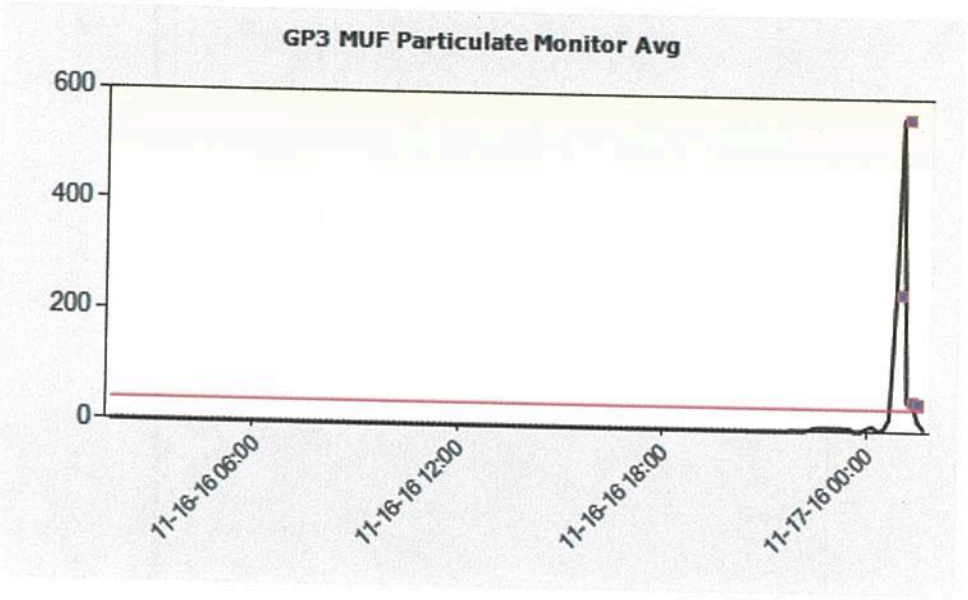


Unit: GP-3 Main Unit Filter
Date: October 5th Duration: 7 hours 40 minutes
Description: **12:40 PM**-The unit was not on load when the high PM alarm was received. Unit was in the process of cooling down for Main Unit Filter repairs to the whale's tail drain line. Excess moisture was being introduced into the MUF at this time. No visible emissions were observed from the GP-3 stack. **15:00 PM**- During startup of GP-3, a high PM alarm was received. The unit was in the process of warming up the Main Unit Filter after repairs. GP-3 was not on Makeload at the time of the alarm. This alarm is likely due to excess moisture that occurs during the heating up and cooling down process of the MUF. No visible emissions observed from the GP-3 stack.

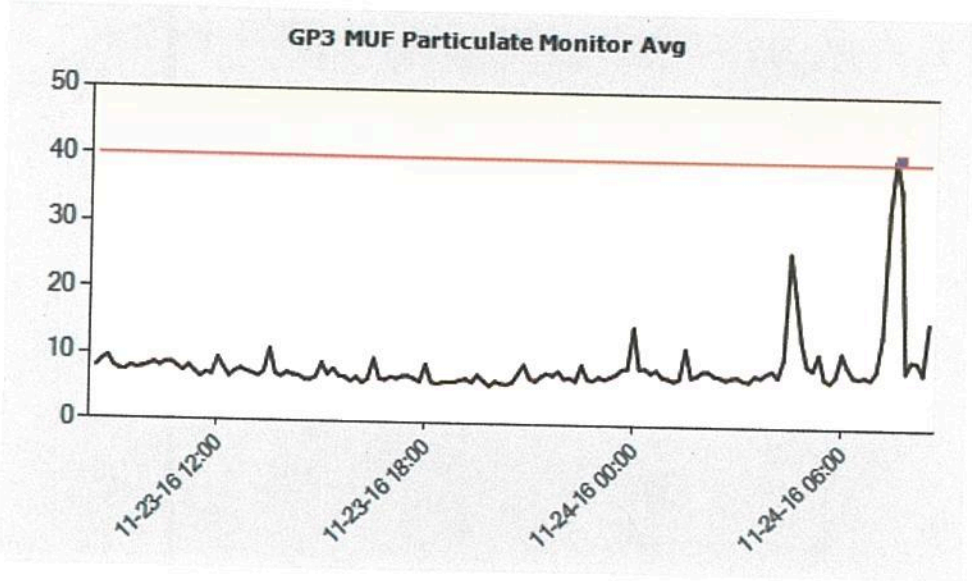


Unit: GP-3 Main Unit Filter
Date: October 21st Duration: 5 hours 50 minutes
Description: Unit is on heat load cooling down the Main Unit Filter for a normal grade change when the high PM alarm was

received. Excess moisture introduced into the MUF with the unit is off load is likely to be the cause of the alarm. No visible emissions were observed, the monitor was cleaned prior to placing the unit back on load. The alarm cleared and normal operation resumed.



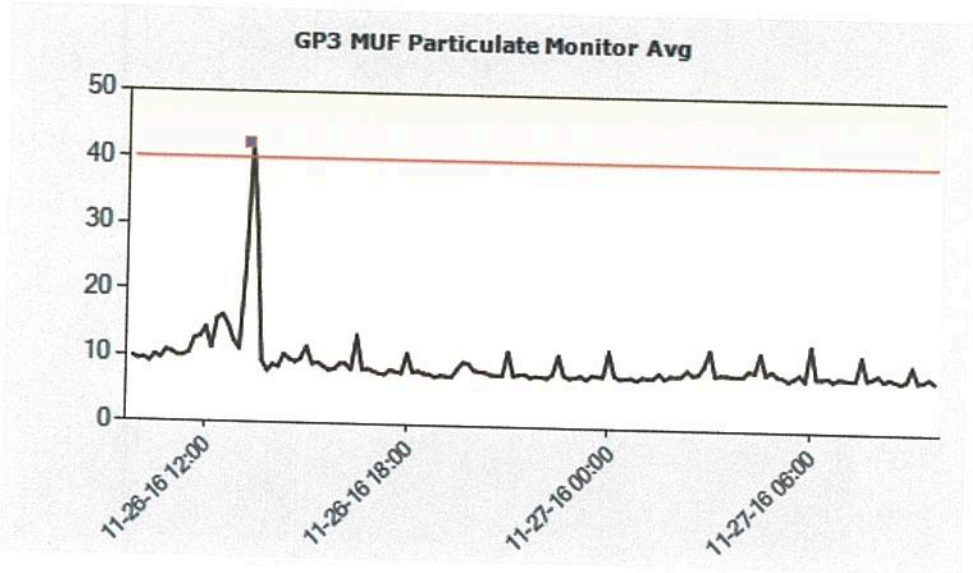
Unit: GP-3 Main Unit Filter
Date: November 17th Duration: 40 minutes
Description: Event occurred during startup of the unit after replacing bags in the MUF. There were no visible emissions observed.



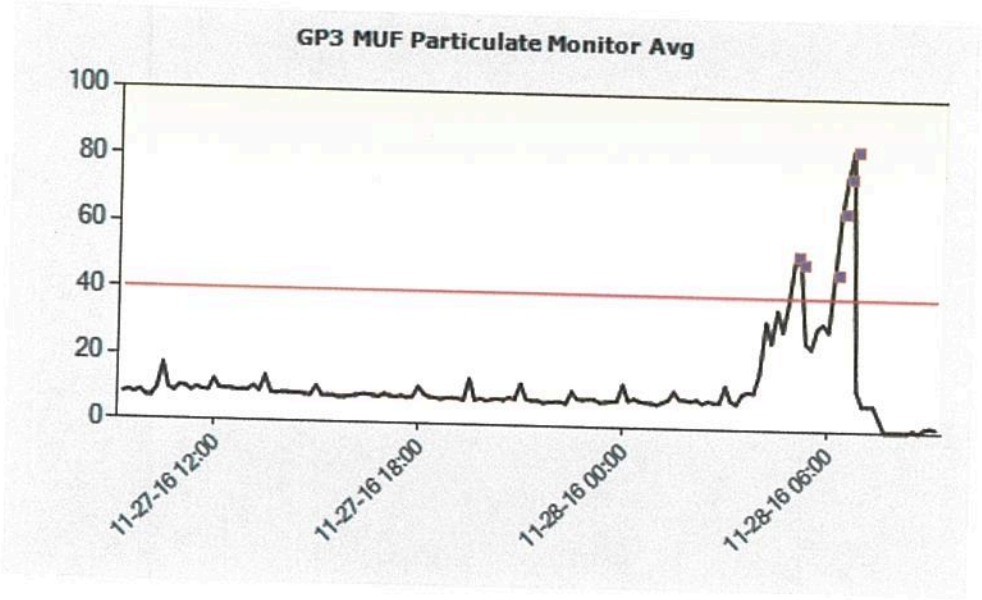
Unit: GP-3 Main Unit Filter
Date: November 24th Duration: 10 minutes
Description: High PM alarm occurred while unit was on makeload. Shift foreman performed a visual observation and no emissions were observed. Foreman then purged with air to clean monitor. PM alarm cleared after doing

PAMPA PLANT

REPORTING PERIOD: JULY 1, 2016 – DECEMBER 31, 2016

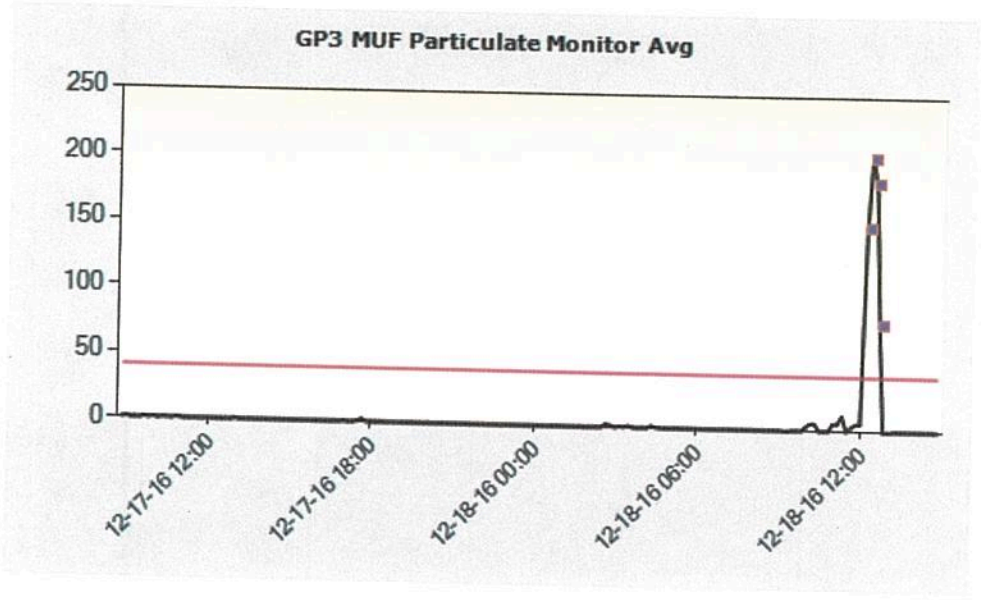


Unit: GP-3 Main Unit Filter
Date: May 14th Duration: 7 hours
Description: A high PM alarm was received by the Unit 5 operator. The operator went to observe the thermal oxidizer and did not see visual emissions. Maintenance was called to investigate. The monitor was pulled and observed to be dirty. The unit was taken down cold and entry into the MUF for a bag inspection was performed. I was determined that 1 MUF bag was ripped open. The bag was replaced new and the unit returned to operations. No alarms have occurred since.

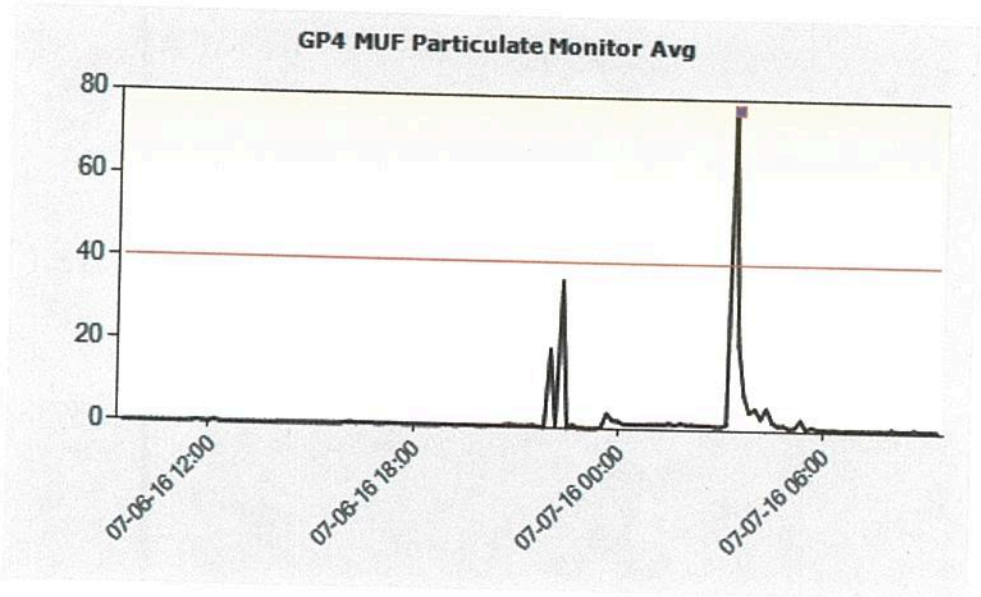


PAMPA PLANT

REPORTING PERIOD: JULY 1, 2016 – DECEMBER 31, 2016



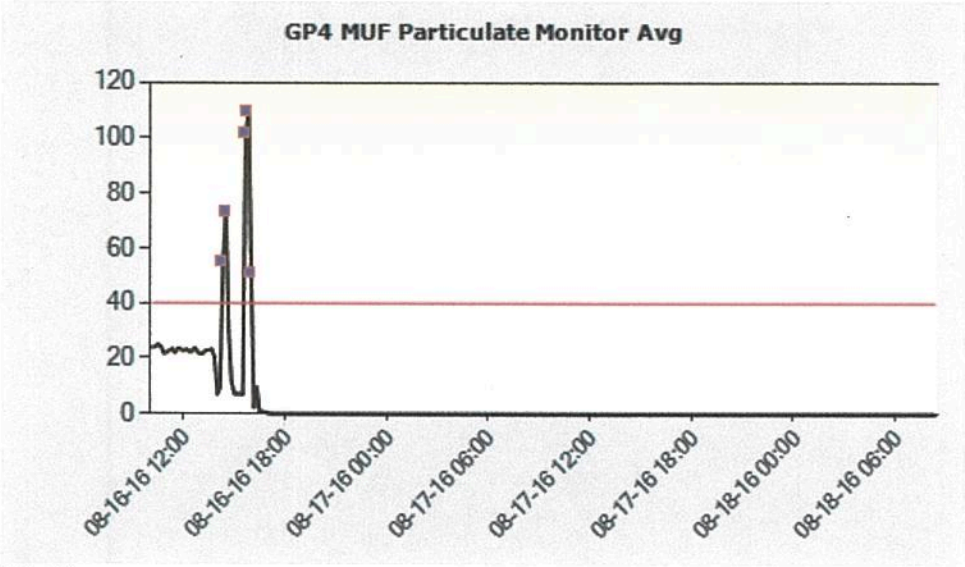
Unit: GP-3 Main Unit Filter
Date: December 18th Duration: 40 minutes
Description: The unit was on heat load during this event. There were no visible emissions observed. Maintenance cleaned monitor and no alarms followed.



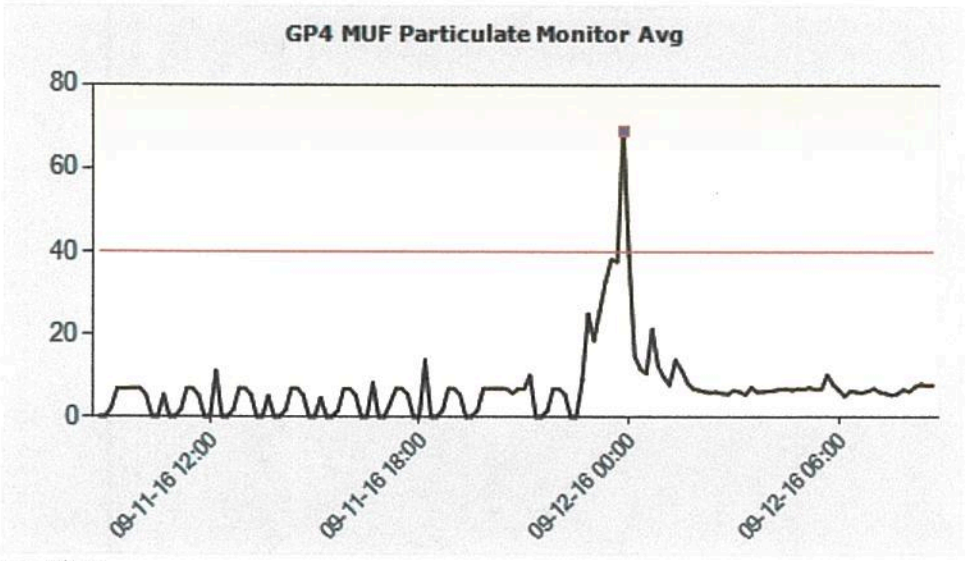
Unit: GP-4 Main Unit Filter
Date: July 7th Duration: 10 minutes
Description: Unit 4 was in the process of being started up from a long curtailment. When the high PM alarm was received, that operator notified the shift foreman and went to perform a visual inspection of the GP-4 flare. The flare did not have visible emissions coming from it. The alarm cleared within 10 minutes and has not alarmed since. This alarm was caused due to normal startup sequence after a long downtime spell.

PAMPA PLANT

REPORTING PERIOD: JULY 1, 2016 – DECEMBER 31, 2016



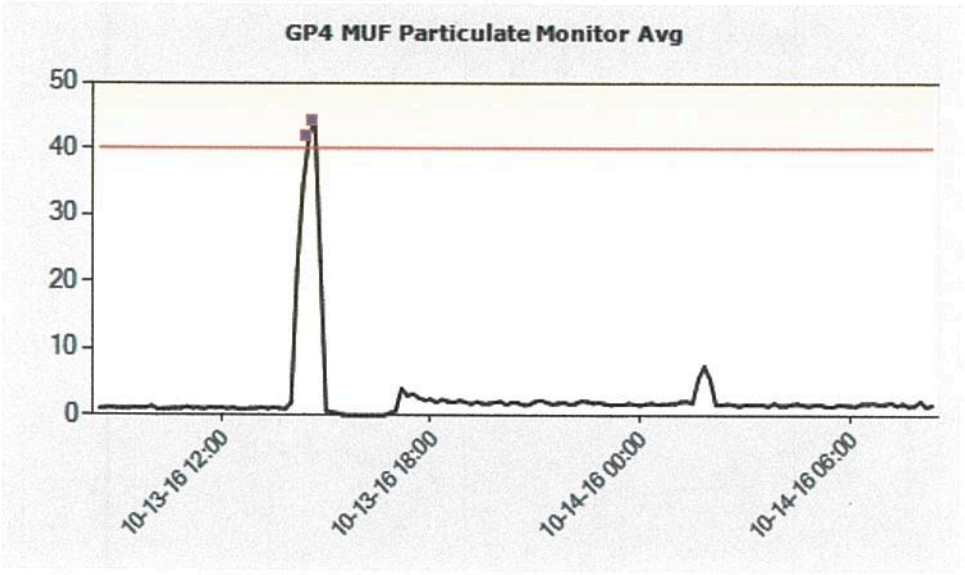
Unit: GP-4 Main Unit Filter
Date: August 16th Duration: 1 hour 50 minutes
Description: The unit was on Heatload and not making product when the high PM alarm was received. Unit was in the process of cooling down for a long curtailment. Excessive water was being placed in the MUF for cooling purposes. No visible emissions were observed and alarm cleared once stable cooling conditions were reached.



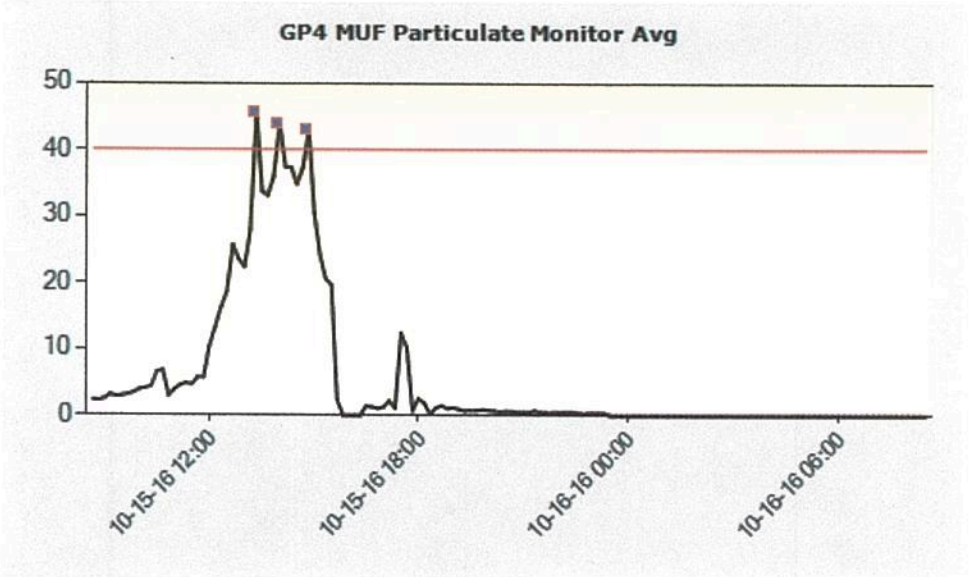
Unit: GP-4 Main Unit Filter
Date: September 11th Duration: 10 minutes
Description: Alarm occurred when the MUF was being warmed up from being down cold more than 20 days. Alarm may have occurred due to moisture during the warm up process. No visible emissions observed.

PAMPA PLANT

REPORTING PERIOD: JULY 1, 2016 – DECEMBER 31, 2016



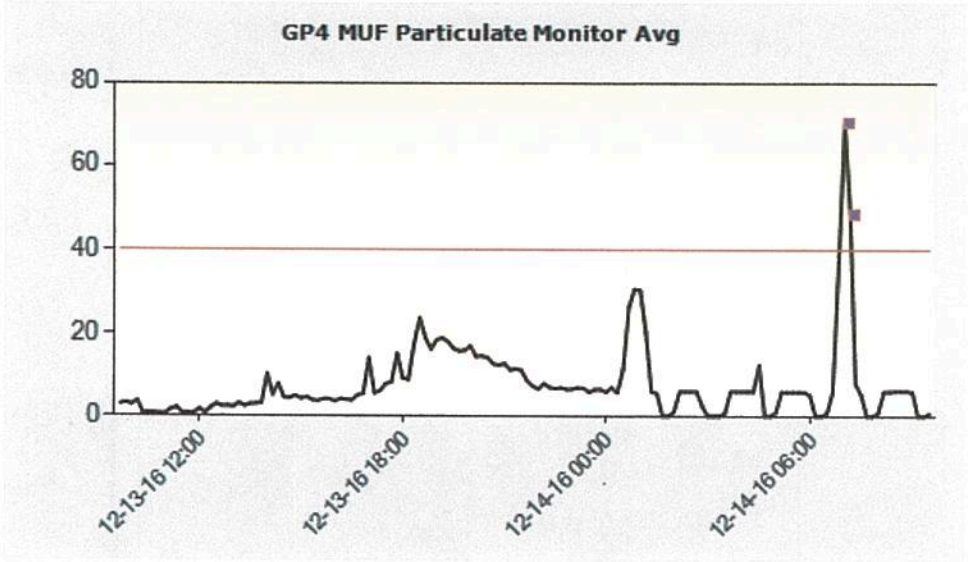
Unit: GP-4 Main Unit Filter
Date: October 13th Duration: 20 minutes
Description: Operator noticed GP4 MUF exceed 40 PM capacity. Foreman did a visual on the MUF stack and did not see any emissions. The unit was taken to Heatload for maintenance to clean out the PM monitor.

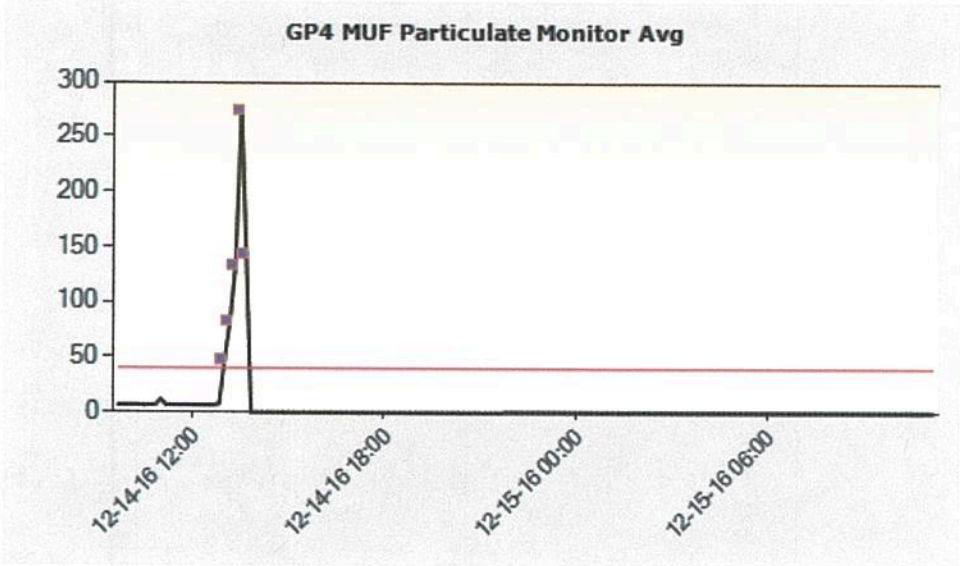


Unit: GP-4 Main Unit Filter
Date: October 15th Duration: 1 hour 40 minutes
Description: Event occurred due to dirty PM monitor. Foreman performed a visual observation and no emissions were observed. The foreman purged the PM monitor in an attempt to clean it but was unsuccessful. Maintenance was called to clean the monitor and the alarm cleared upon doing so.

PAMPA PLANT

REPORTING PERIOD: JULY 1, 2016 – DECEMBER 31, 2016

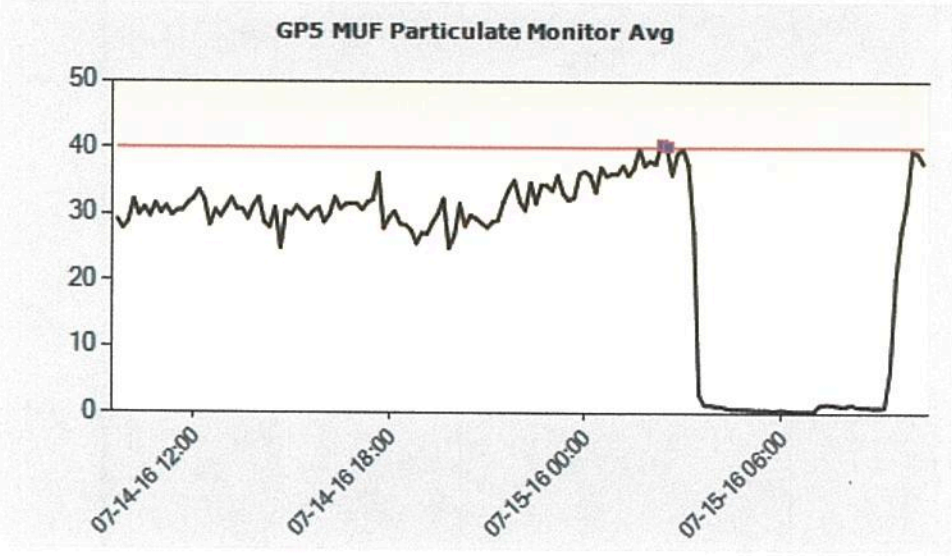


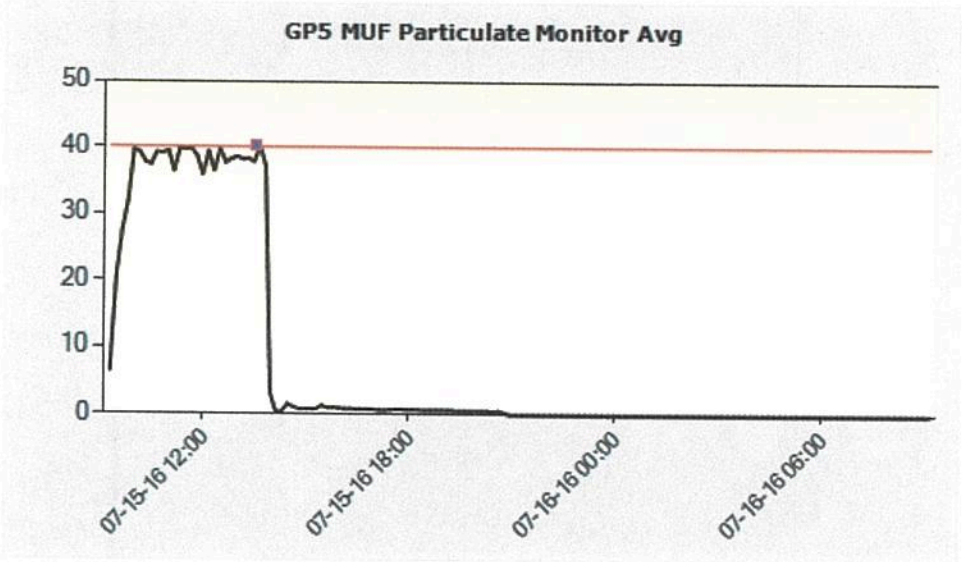


Unit: GP-4 Main Unit Filter
Date: December 14th Duration: 1 hour 40 minutes
Description: Unit was on heatload, cooling down for confined space entry during this alarm. There were no visible emissions observed.

PAMPA PLANT

REPORTING PERIOD: JULY 1, 2016 – DECEMBER 31, 2016

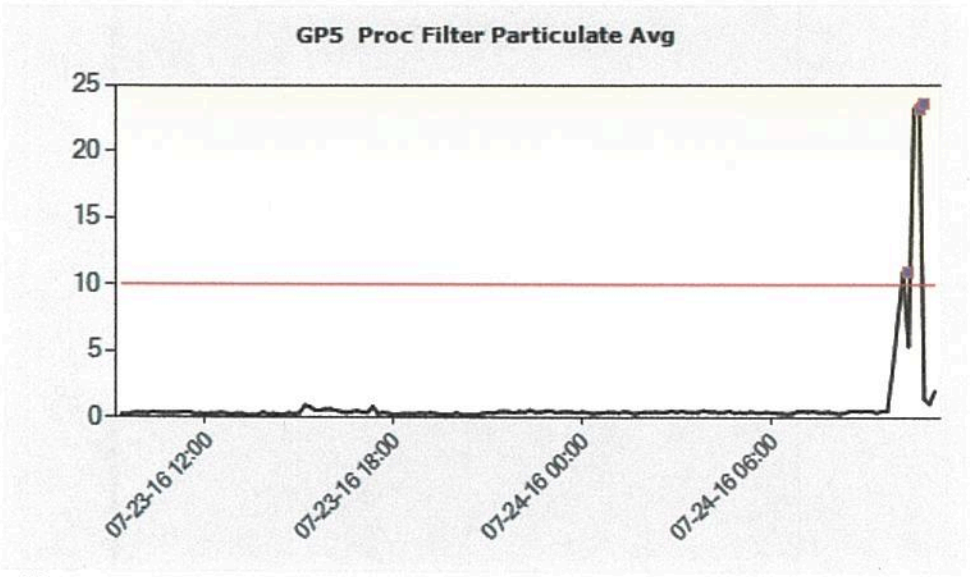




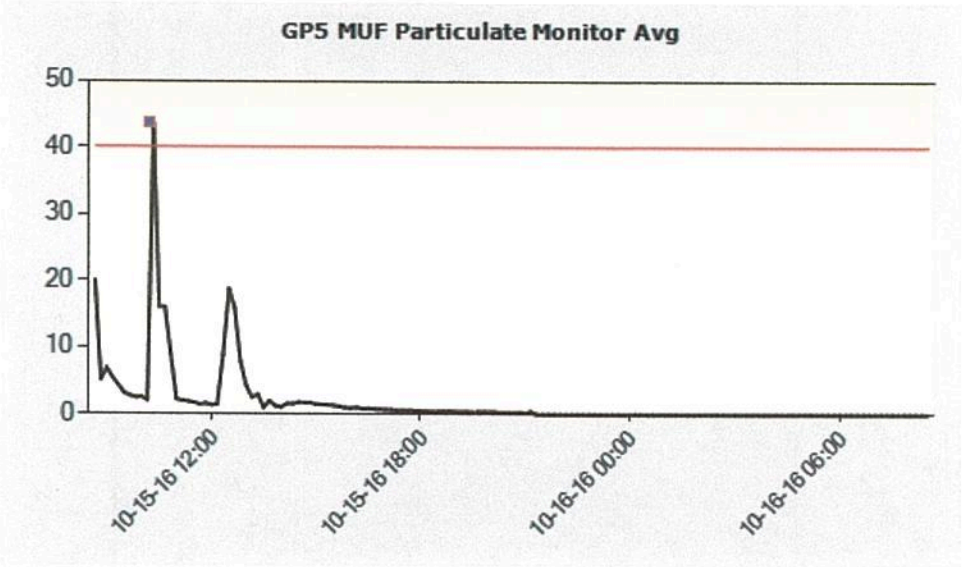
Unit: GP-5 Main Unit Filter
Date: July 15th Duration: 15 minutes
Description: Alarms occurred while the unit was shut down for a MUF inspection. No visible emissions observed.

PAMPA PLANT

REPORTING PERIOD: JULY 1, 2016 – DECEMBER 31, 2016



Unit: GP-5 Process Filter
Date: July 24th Duration: 40 minutes
Description: High alarm occurred due to PM monitor needing to be cleaned. Maintenance was called out to clean monitor. No visible emissions were observed.



Unit: GP-5 Process Filter
Date: October 15th Duration: 15 minutes
Description: High alarm occurred due to PM monitor needing to be cleaned. The unit was taken down to check for bag leaks while maintenance was being called. No visible emissions were observed.

PAMPA PLANT

REPORTING PERIOD: JULY 1, 2016 – DECEMBER 31, 2016

ATTACHMENT 3

EXPLANATION OF PERIODS OF PM EARLY WARNING SYSTEM DOWNTIME

PAMPA PLANT

REPORTING PERIOD: JULY 1, 2016 – DECEMBER 31, 2016

PMEWS Data Availability Detail: 01-Jul-2016 to 31-Dec-2016

CABOT

Unit	Source	Start Time	End Time	Duration Hours	Alarm Type	Status Code	Status Description	Consent Decree
GP-0	Process Filter Dry Drum	21-Jul-2016 21:25	21-Jul-2016 21:25	0.02	General	16	No Response From Sensor	Y
GP-0	Process Filter Dry Drum	21-Jul-2016 21:55	21-Jul-2016 21:56	0.03	General	16	No Response From Sensor	Y
GP-0	Process Filter Dry Drum	21-Jul-2016 21:58	21-Jul-2016 21:58	0.02	General	16	No Response From Sensor	Y
GP-0	Process Filter Dry Drum	21-Jul-2016 22:18	21-Jul-2016 22:19	0.03	General	16	No Response From Sensor	Y
GP-0	Process Filter Dry Drum	21-Jul-2016 22:21	21-Jul-2016 22:30	0.17	General	16	No Response From Sensor	Y
GP-0	Process Filter Dry Drum	21-Jul-2016 22:49	21-Jul-2016 22:49	0.02	General	16	No Response From Sensor	Y
GP-0	Process Filter Dry Drum	21-Jul-2016 22:51	21-Jul-2016 22:59	0.15	General	16	No Response From Sensor	Y
GP-0	Process Filter Dry Drum	21-Jul-2016 23:23	21-Jul-2016 23:27	0.08	General	16	No Response From Sensor	Y
GP-0	Process Filter Fluffy-1	21-Jul-2016 21:22	21-Jul-2016 21:26	0.08	General	16	No Response From Sensor	Y
GP-0	Process Filter Fluffy-1	21-Jul-2016 21:53	21-Jul-2016 21:53	0.02	General	16	No Response From Sensor	Y
GP-0	Process Filter Fluffy-1	21-Jul-2016 21:55	21-Jul-2016 21:59	0.08	General	16	No Response From Sensor	Y
GP-0	Process Filter Fluffy-1	21-Jul-2016 22:02	21-Jul-2016 22:02	0.02	General	16	No Response From Sensor	Y
GP-0	Process Filter Fluffy-1	21-Jul-2016 22:13	21-Jul-2016 22:13	0.02	General	16	No Response From Sensor	Y
GP-0	Process Filter Fluffy-1	21-Jul-2016 22:15	21-Jul-2016 22:29	0.25	General	16	No Response From Sensor	Y
GP-0	Process Filter Fluffy-1	21-Jul-2016 22:31	21-Jul-2016 22:31	0.02	General	16	No Response From Sensor	Y
GP-0	Process Filter Fluffy-1	21-Jul-2016 22:45	21-Jul-2016 22:45	0.02	General	16	No Response From Sensor	Y
GP-0	Process Filter Fluffy-1	21-Jul-2016 22:47	21-Jul-2016 22:47	0.02	General	16	No Response From Sensor	Y
GP-0	Process Filter Fluffy-1	21-Jul-2016 22:50	21-Jul-2016 22:59	0.17	General	16	No Response From Sensor	Y
GP-0	Process Filter Fluffy-1	21-Jul-2016 23:02	21-Jul-2016 23:02	0.02	General	16	No Response From Sensor	Y
GP-0	Process Filter Fluffy-1	21-Jul-2016 23:22	21-Jul-2016 23:22	0.02	General	16	No Response From Sensor	Y
GP-0	Process Filter Fluffy-1	21-Jul-2016 23:24	21-Jul-2016 23:28	0.07	General	16	No Response From Sensor	Y
GP-0	Process Filter Fluffy-1	21-Jul-2016 23:34	21-Jul-2016 23:34	0.02	SelfTest	16384	Sensor in Maintenance Mode	Y
GP-2	Dryer	06-Jul-2016 11:37	06-Jul-2016 11:59	0.38	General	16	No Response From Sensor	Y
GP-2	MUF	01-Sep-2016 09:28	01-Sep-2016 11:04	1.62	SelfTest	16384	Sensor in Maintenance Mode	Y
GP-2	MUF	28-Sep-2016 20:56	28-Sep-2016 21:40	0.75	SelfTest	16384	Sensor in Maintenance Mode	Y
GP-2	MUF	02-Oct-2016 03:49	02-Oct-2016 04:25	0.62	SelfTest	16384	Sensor in Maintenance Mode	Y
GP-2	MUF	05-Oct-2016 10:50	05-Oct-2016 10:52	0.05	General	16	No Response From Sensor	Y
GP-2	MUF	11-Nov-2016 16:01	11-Nov-2016 18:19	2.32	General	16	No Response From Sensor	Y
GP-2	Process Filter	17-Nov-2016 08:27	17-Nov-2016 09:30	1.07	SelfTest	16384	Sensor in Maintenance Mode	Y
GP-3	MUF	06-Jul-2016 11:37	06-Jul-2016 12:05	0.48	General	16	No Response From Sensor	Y

PAMPA PLANT

REPORTING PERIOD: JULY 1, 2016 – DECEMBER 31, 2016

GP-3	MUF	06-Jul-2016 12:06	06-Jul-2016 12:09	0.07	SelfTest	16384	Sensor in Maintenance Mode	Y
GP-3	MUF	21-Sep-2016 09:12	21-Sep-2016 11:15	2.07	SelfTest	16384	Sensor in Maintenance Mode	Y
GP-3	MUF	24-Oct-2016 18:37	24-Oct-2016 19:00	0.40	SelfTest	16384	Sensor in Maintenance Mode	Y
GP-3	MUF	28-Nov-2016 06:42	28-Nov-2016 07:25	0.73	General	16	No Response From Sensor	Y
GP-3	MUF	01-Dec-2016 13:08	01-Dec-2016 13:24	0.28	SelfTest	16384	Sensor in Maintenance Mode	Y
GP-3	MUF	18-Dec-2016 12:38	18-Dec-2016 13:06	0.48	SelfTest	16384	Sensor in Maintenance Mode	Y
GP-4	MUF	06-Jul-2016 09:08	06-Jul-2016 12:10	3.05	SelfTest	16384	Sensor in Maintenance Mode	Y
GP-4	MUF	06-Jul-2016 12:23	06-Jul-2016 13:48	1.43	Aspen	1	Flat Line-No New Data in Past Hr	Y
GP-4	MUF	12-Sep-2016 09:23	12-Sep-2016 11:13	1.85	SelfTest	16384	Sensor in Maintenance Mode	Y
GP-4	MUF	13-Oct-2016 15:24	13-Oct-2016 16:43	1.33	SelfTest	16384	Sensor in Maintenance Mode	Y
GP-4	MUF	15-Oct-2016 15:32	15-Oct-2016 16:20	0.82	SelfTest	16384	Sensor in Maintenance Mode	Y
GP-4	MUF	14-Dec-2016 13:41	14-Dec-2016 21:40	8.00	SelfTest	16384	Sensor in Maintenance Mode	Y
GP-4	MUF	14-Dec-2016 21:41	15-Dec-2016 00:00	2.32	General	16	No Response From Sensor	Y
GP-4	MUF	15-Dec-2016 00:00	15-Dec-2016 17:08	17.15	General	16	No Response From Sensor	Y
GP-5	MUF	15-Jul-2016 05:02	15-Jul-2016 05:02	0.02	SelfTest	16384	Sensor in Maintenance Mode	Y
GP-5	MUF	15-Jul-2016 06:16	15-Jul-2016 07:01	0.77	General	16	No Response From Sensor	Y
GP-5	MUF	15-Jul-2016 07:03	15-Jul-2016 07:30	0.47	General	16	No Response From Sensor	Y
GP-5	MUF	18-Jul-2016 09:11	18-Jul-2016 10:59	1.82	SelfTest	16384	Sensor in Maintenance Mode	Y
GP-5	MUF	31-Aug-2016 10:35	31-Aug-2016 12:05	1.52	SelfTest	1	Zero Fault (Main Probe)	Y
GP-5	MUF	14-Oct-2016 09:09	14-Oct-2016 09:47	0.65	General	16	No Response From Sensor	Y
GP-5	MUF	15-Oct-2016 10:17	15-Oct-2016 10:45	0.48	General	16	No Response From Sensor	Y
GP-5	MUF	11-Nov-2016 11:43	11-Nov-2016 13:04	1.37	SelfTest	16384	Sensor in Maintenance Mode	Y
GP-5	Process Filter	24-Jul-2016 11:33	24-Jul-2016 12:19	0.78	SelfTest	16384	Sensor in Maintenance Mode	Y
GP-5	Process Filter	05-Oct-2016 10:50	05-Oct-2016 10:52	0.05	General	16	No Response From Sensor	Y
GP-5	Process Filter	11-Nov-2016 16:01	11-Nov-2016 16:01	0.00	General	16	No Response From Sensor	Y
GP-9	Process Filter	11-Jul-2016 09:42	11-Jul-2016 09:42	0.02	General	16	No Response From Sensor	N
GP-9	Process Filter	19-Aug-2016 16:51	19-Aug-2016 16:53	0.05	General	16	No Response From Sensor	N